EXHIBIT 9

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             IN THE UNITED STATES DISTRICT COURT
         FOR THE EASTERN DISTRICT OF NORTH CAROLINA
 2
                      SOUTHERN DIVISION
                       NO. 7:23-CV-897
 3
     IN RE:
 4
     CAMP LEJEUNE WATER LITIGATION )
 5
     This Document Relates to:
6
     ALL CASES
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9
                  VIDEOTAPED DEPOSITION OF
                   REMY J-C. HENNET, PH.D.,
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11
     a witness herein, called by the Plaintiffs for
     examination, taken by and before Ann Medis, RPR, CLR,
12
     CSR-WA, and Notary Public in and for the Commonwealth
     of Pennsylvania, via Zoom Videoconference, at the
13
     offices of Motley Rice, 401 9th Street, NW, Washington,
         20004, on Thursday, March 20, 2025, commencing at
     9:05 a.m.
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1		APPEARANCES
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	Bradley Lo	oy, videographer
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3 THE VIDEOGRAPHER: We are now other

My name is Bradley Loy. I'm a 4

videographer for Golkow. Today's date is 5

6 March 20, 2025. The time 9:05. This deposition

is being held at 401 9th Street, Northwest,

Washington, D.C., taken in the matter of Camp 8

LeJeune Water Litigation, for the United States

District Court for the Eastern District of North 10

11 Carolina, Southern Division. The deponent is Remy

12 J.-C. Hennet.

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13 Will counsel please identify themselves.

MR. DEAN: Good morning. This is Kevin 14

15 Dean here on behalf of THE PLG.

16 MS. O'LEARY: Allison O'Leary on behalf

17 of the United States.

18 MS. BAUGHMAN: Laura Baughman on behalf

19 of plaintiffs.

2.0 MS. BOLTON: Devin Bolton on behalf of

21 the plaintiffs.

MS. HORAN: Alanna Horan on behalf of 22

23 the United States.

24 MS. JOHNSON: Margaret Johnson on behalf

25 of the plaintiffs.

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Page 7 1 THE VIDEOGRAPHER: Will the court 2 reporter please swear in the witness. 3 REMY J.-C. HENNET, PH.D., having been first duly sworn, was examined 4 and testified as follows: 5 EXAMINATION 6 BY MR. DEAN: 7 Good morning, Dr. Hennet. 8 Q. 9 Α. Good morning. 10 Ο. Did I pronounce your name correctly? 11 Yes, you did. Α. 12 I'm going to try to always refer to you Ο. 13 as Dr. Hennet. But I've read so much about you in 14 the last several months, it may very be I 15 mistakenly refer to you as Remy, but I don't do so 16 out of disrespect. Okay. 17 Α. You choose. Thank you. You just swore under oath to 18 Ο. tell the truth. Do you understand what that means 19 2.0 today? 21 Yes, I do. Α. 22 And are you having any illnesses today 23 or anything wrong with you that would prevent you from completely responding to all my questions and 24

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telling the truth?

A. I do not.

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- Q. You're not under any medications or anything like that that would cause you not to be able to testify truthfully?
 - A. I am not.
- Q. From your CV, I believe at least since 2020 you've been deposed about three times; right?
 - A. I would have to look at my CV.
- Q. We'll look at that in a minute. My point is there's a few typical ground rules for depositions. First of all, if you feel like you need to take a break at all during the deposition today, you tell me, and I'll be happy to stop and we'll take a break. I recognize the camera is rolling and a lot of people in the room, but we'll be as informal as we can. And if need to take a break, you just and I'll stop. Okay?
 - A. I will.
- Q. If, however, we do take a break, if you would he refrain from talking with the lawyers with regard to your testimony today, I would appreciate that. Okay?
 - A. Yes.
- Q. Now, sometimes I ask two questions in one. I'll be honest with you. It's called a

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compound question. Lawyers may even object. But what I want to make sure you do today is I ask a question that you understand and you feel like you can respond. And if I don't, you tell me you don't understand my question, and I'll rephrase it or re-ask it. Okay?

- A. I do understand.
- Q. Because I want to be able to rely today on your responses in the sense that you understood my question. Okay?
 - A. I understand that.
- Q. So if you answer a question and you don't ask me to re-ask it or that you don't understand it, then I'm going to assume you understood my question. Fair?
 - A. Fair.

(Hennet Exhibit 1 was marked.)

18 BY MR. DEAN:

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Q. Now I'm going to show you what I've marked as Deposition Exhibit No. 1 Dr. Hennet.

It's called a deposition notice. And attached to it is a subpoena. At the back of the subpoena is a list documents that we asked that you and S.S. Papadopulos & Associates produce to us.

Do you see that list?

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1	Α.	Yes,	I	do
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- Q. Now, my first question about that is:
 Did you bring anything today additional that that
 was responsive to that subpoena?
 - A. No. I don't have anything.
- Q. Have you seen that list of items to bring to the deposition attached to the subpoena before today?
 - A. I have.
- Q. Did you personally or anyone at your direction after seeing that subpoena undertake an effort to gather documents?
- A. To the extent that we could answer those questions, it was done. I asked, you know -- I reviewed my files to respond to the subpoena. Everything I did have, I just provided it to counsel.
- Q. And when would you have provided that to counsel after receipt of the subpoena?
 - A. I don't recall when.
- Q. Actually, I've got a copy right here myself. Look at the date of the subpoena.

The original subpoena, it was the middle of February. I'll get a specific date in just a moment. But it was sometime in the middle of

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February	that	the	subpo	ena	was	fiı	rst	serve	ed wi	th	а
depositio	on not	cice	after	we	agre	eed	on	your	date	fc	r
your depo	sitio	on.									

What my question you to is, that's a little over 30 days ago, 30, 35, 40 days ago. Do you know when you responded and provided documents to the Department of Justice to produce in this case after receipt of the first subpoena?

MS. O'LEARY: Object to the form and foundation.

THE WITNESS: I do not recall when. BY MR. DEAN:

Q. Now, you said you supplied some materials that you could find or that were responsive.

Did you hand deliver them, or did you send them electronically, a share file? Do you remember the delivery method of that information?

- A. I do not recall the details of it, but most of it was done, I suppose, electronically.
- Q. Did you send an email forwarding the responsive information or a staff member do that?
 - A. I don't recall who did it.
- Q. But either you or someone working at your direction would have sent an email to the

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Department of Justice or one of its attorneys saying, hey, here's attached FYI that you asked for or a response to the subpoena. It would be some sort of general email along those lines; correct?

- A. I don't recall. A lot of the interactions with counsel was, you know, meetings, speaking over the phone or those kind of interactions.
- Q. Understood. But what I'm trying to do is after receipt of the subpoena, which was sometime in February, February 12, 2025 -- you earlier testified you sent information, documents, things that were in response to the subpoena electronically; right?

MS. O'LEARY: Object to foundation and form.

THE WITNESS: I didn't say that. I say some of it was electronic, not all of it.

BY MR. DEAN:

- O. And who would have sent it?
- A. I don't recall. It could be me or it could be -- it would have been me, I suppose.

(Hennet Exhibit 2 was marked.)

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BY MR. DEAN:

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Q. Let me go ahead and mark as Exhibit 2 something called an objection. Now, I'm not sure if you've seen this document or not. Just for the record and for your benefit, this is what is referred to as a response and objection to Exhibit 1, the subpoena.

Do you see that?

- A. I'll look at it.
- Q. You can actually go to last page and see it was served on March 14, 2025. It's not important necessarily that you go through it. I don't have any specific questions for you. You can glance that you it. I guess I'm trying to see if you had seen it before today.

(Witness reviewed the exhibit.)

THE WITNESS: It sounds familiar, but I don't recall by memory if I saw this exact document.

BY MR. DEAN:

- Q. Now, get Exhibit 1 back out, if you don't mind, and turn to Exhibit A that's at the back that has the list of documents, if you don't mind.
 - MS. O'LEARY: What page is that?

MR. DEAN: Just Exhibit A behind the subpoena.

BY MR. DEAN:

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- Q. Do you see that there's basically 16 numbered items over three pages?
 - A. Yes. I do see 16 paragraphs.
- Q. Now, I'll mark it in a moment, but I received I guess it was last Friday and then last night a supplemental bill, invoice. I don't remember the totality of the pages, but they were there was invoices from S.S. Papadopulos & Associates to the Department of Justice for billings in this case.

Do you know what I'm generally referring to?

MS. O'LEARY: Object to the form foundation.

THE WITNESS: I can guess, but I don't know exactly what you are referring to.

20 BY MR. DEAN:

Q. I'll show it to you in a moment. Let's read together No. 5. It asks for all bills, invoices or other documents related to payments from the United States or any of its agencies to you, S.S. Papadopulos, or principals or agents of

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S.S. Papadopulos relating to any work completed by Remy J.C. Hennet and Alexandros Spilotopoulos.

Do you see that?

A. I see that.

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Q. And then No. 6 asks a little -- let me stay on five just for a moment.

When you -- I'll get to a point where we talk about everything you've done to prepare for your deposition, but let's just use yesterday for an example. I assume you did a little prep work of some sort yesterday.

- A. I did.
- Q. Now, at the end of the day, did you write down on a note pad your time, or did you go into a computer or a program or something and input your time or someone do it for you?
 - A. I did not do that yesterday.
- Q. But is that normally how you track your time?
- A. Normally I track my time daily or sometimes it takes two days. It depends if I'm on travel or those type of issues.
- Q. I'm way behind on my time, so don't feel bad. Lawyers do the same thing.

How do you keep track of your daily

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act	civ	ities	s the	ougl	ı? I	00	you	handw	rite	on	а	note	pad
or	do	you	put	it	into	o a	a cor	nputer	?				

- A. We have a system. It's a software system into which we enter basically our time for billing purposes.
 - Q. And what is that program called?
- A. I don't know. I don't recall the name of it.
- Q. It's generic, but there's one called Timekeeper. You don't remember the name of the computer program?
- A. I don't remember the name of the computer program.
- Q. Have you in the past -- say you wanted to do a review of your time. Maybe someone asked you to take a look at your time. Is that something that you could print out a summary of your time so you can see what you entered into the computer, say, for a month, like last February?

Could you print out your time entries to see what you did in case there was a need?

A. I don't know how to do it, but admin, administration staff is doing that. And if I wanted to see something, I would have to request it.

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- Q. And who would you go to to request that information?
 - To our administrative person. Α.
 - And who is that? Ο.
 - Her name is Seema, S-E-E-M-A, and she's Α. one of the administrative person that I would request that from.
 - No. 6 is a similar question, but a little different. It says all bills, invoices or other documents relating to payments from the U.S. or any of its agencies to you, S.S. Papadopulos principals or agents, related in any way to Camp LeJeune water litigation.

Do you see that?

- I see that. Α.
- It also refers to the CLJ litigation. Ο. It refers to the word "remediation" related to Camp LeJeune.

Do you see those?

- Α. It says from 2004 through the present.
- Correct. My question to you on 5 and 0. 6 -- let's go to 5. Did you respond to No. 5 and send anything or documents to the Department of Justice in response to No. 5?
 - Α. I believe it was done, but via

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- 1 | administration, not me.
- Q. And that related to your work on this case?
 - A. I do not know exactly what was transferred.
 - Q. No. 6, did you gather any historic documents, bills, invoices or anything related to your time working on Camp LeJeune issues, remediation issues from 2004 to the present? Did you send anything to the Department of Justice to respond to No. 6?

MS. O'LEARY: Object to form.

THE WITNESS: I did not personally, but admin may have.

15 BY MR. DEAN:

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- Q. You don't know if they sent documents responsive to 6 or not?
- A. I do not know what I could find because we are talking about a long time ago.
- Q. No. 7 says all timekeeping and billing records related to time you did any work on Camp LeJeune litigation from the time you or S.S. Papadopulos were first retained, hired or contracted.

Do you see that?

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1 MS. O'LEARY: Object to foundation.

THE WITNESS: I see that.

BY MR. DEAN:

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- Q. Did you or someone S.S. Papadopulos & Associates send any other supporting timekeeping and billing records related to work done by you or S.S. Papadopulos & Associates from the first time you were retained for anything related to Camp LeJeune? Do you know if you responded to No. 7?
- A. Again, that would have gone through admin, administration at SSPA. That's what I can recall.
- Q. With regard to five, six and seven, we've now established that something was sent. You just don't know specifically what it was. If it was done, it was through Ms. Seema.

MS. O'LEARY: Object to form.

THE WITNESS: I don't know if it was done through Ms. Seema, but I don't know what was sent.

21 BY MR. DEAN:

Q. No. 8 talks about emails. It says communications, but it's primarily looking for letters or emails between S.S. Papadopulos and the U.S. from 2004 to the present related to any

Page 20 of 370

issues concerning Camp LeJeune, remediation related to Camp LeJeune.

Do you see No. 8?

MS. O'LEARY: And object to form and foundation.

THE WITNESS: I see No. 8.

7 BY MR. DEAN:

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- Q. And you see it asks for stuff back from 2004? Do you see that?
 - A. I see that.
- Q. Did you personally search for documents that were responsive to No. 8 and provide them either to administration to provide to the Department of Justice or you personally remember sending some stuff to the Department of Justice to respond to No. 8?
- A. Well, all communications by email was basically for this litigation always with a lawyer present in the conversation, and those communications particularly the lawyers have it.
 - O. The lawyers what?
- A. Lawyers would have that to the extent that they do exist.
- Q. Let's go back to my question. I understood your answer, but my question was a

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little different.

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My question was: After getting this subpoena sometime after February 12, 2025, did you personally go search historic emails, records, communications, letters from 2004 to the present and provide them to the Department of Justice?

MS. O'LEARY: Object to foundation.

BY MR. DEAN: 8

> Ο. That was my question.

MS. O'LEARY: I'm sorry. Object to foundation.

THE WITNESS: I don't recall exactly. The issue is can I retrieve things all way 20 years back. Personally, I can't because we have an archive system. I am not understanding how it is done.

Since then we have changed computer systems. We've changed location. So that's not the type of thing that I do. But it was looked at to see what we could find. And my understanding is Dr. Spiliotopoulos might have done something. I don't know. Personally I gave everything I have to the Department of Justice. That's what I recall.

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H Y	IVIR	DEAN

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Q. Let me go back to my question one more time. I think I understood it, but I just want to be clear.

You didn't personally undertake an effort to search your computer or any file servers or file folders for emails or other communications as far back as 2004 related to Camp LeJeune issues? You didn't personally undertake that effort?

- A. I looked at what I have on my computer and I gave -- I responded to this the way -- I looked. What do I have? I found no email that are old. Whatever emails that are related to this case were basically always in the presence of counsel, and those were -- counsel has copies of it because they were involved.
- Q. I'll use a particular person's name, Scott Williams. He's a NAVFAC employee.

Does that name sound familiar to you?

- A. The same sounds familiar to me.
- Q. But I'm just using that as an example. You know that Camp LeJeune Justice Act and this case was formally initiated sometime in the summer of 2022.

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1 MS. O'LEARY: Object to foundation.

THE WITNESS: Can you repeat the

3 question, please?

4 BY MR. DEAN:

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Q. Yes. This case, the Camp LeJeune

Justice Act litigation for which we're here today
was initiated in the summer of 2022.

MS. O'LEARY: Object to form.

THE WITNESS: I don't recall exactly when that would have been initiated.

BY MR. DEAN:

- Q. Your billing records, which we'll get to in a minute, I think your first invoice was in September of '22.
 - A. That's possible.
- Q. So let's separate. I want to talk to you about 2004 until June, July, August of '22, that time period. Okay?

Did you search for any emails, communications, letters between yourself and any government agency, EPA, Navy, Scott Williams? Did you search for any old emails between 2004 and July of '22?

A. There are none that I could find on my computer.

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Q. And you said something about them being archived in another location. You don't have access to it personally. Can you tell me what you're referring to?

MS. O'LEARY: Object to foundation.

THE WITNESS: I would be referring to, for example, reports that I wrote if I did and other documents that were part of the files at the time.

BY MR. DEAN:

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Q. Do you know anyone that has filed -- let me change it a little. Withdraw that.

Have you or anyone at S.S. Papadopulos & Associates filed a Camp LeJeune Justice Act claim?

MS. O'LEARY: Object to foundation.

THE WITNESS: I have not, and I don't know about -- I don't know what all other people do.

BY MR. DEAN:

- Q. Do you know of a relative that you have or a friend that has filed Camp LeJeune Justice Act claim?
- A. I do not know of any such person. I want to say I don't know if they did it or not. I do not know anybody who did.

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Q. Now, do you remember when you became
aware of a Marines military base known as Camp
LeJeune? And you don't have to be on a specific
date. Do you know generally when you first
learned? Is that something you learned in high
school or college or after you became a
professional? Do you know when you first became
aware there was a Marines base called Camp
LeJeune?

- A. I do not recall when. Camp LeJeune is a big important Defense Department facility. I read the newspaper. So I don't know when I would have first heard about Camp LeJeune, per se.
- Q. Do you remember when you first might have been hired by any United States government agency or military organization to do any sort of work at Camp LeJeune?
- A. Yes. That would have been around the mid 2005 period. I know that in 2005 I did work on Camp LeJeune issues.
- Q. Do you remember who contracted or hired, reached out to you or S.S. Papadopulos to do some work related to Camp LeJeune?
 - A. The Department of Justice.
 - Q. So the first time you were asked do any

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work related to Camp LeJeune, as best you can remember as you sit here today, it had to do with the Department of Justice reaching out and saying inquiring about retaining you and your company to do some work?

- My recollection is that the person who Α. has been -- was contacted for doing work was Gordon -- Mr. Gordon Bennett. And then I got involved as well.
- We'll come back to that in a moment. 10 Ο. 11 (Hennet Exhibit 3 was marked.)

BY MR. DEAN: 12

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- 13 Let's go ahead and mark your report as 14 Exhibit 3. I've handed you Exhibit 3. Can you 15 identify Exhibit 3?
 - The first page of Exhibit 3 is expert Α. report of Remy J.C. Hennet.
 - And it's dated December 9, 2024. Do you 0. see that?
 - Α. That's correct.
 - At the time you issued this report -- I Ο. think your signature on it at the end. Your signature is on page 2 of this document.

Do you see that?

Α. That's correct.

And it says it's an expert report of Remy J.C. Hennet, and it's got the style of this case.

Do you see that?

Yes, I do. Α.

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- At the time of your signing this report, Ο. do you believe you had all of the information and data in order to provide the opinions that are listed in this report?
- At the time of my expert report, all the opinions that I expressed in the report were based on the information that I had at that time and before.
- And at that time, to the extent you have Ο. information and opinions in this report, you had at that time all the information you felt like and documents and data to issue these opinions?
 - Yes, I did. Α.
- Now, you issued it December 9. We're here today on March 20, 2025, about three months, give or take.

Is there any of your opinions in this report that you want to change, take back, modify or add to so that it is correct and complete?

Α. All the opinions in my report I stand by

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I want to add that in February after my report, I did go back to Camp LeJeune, and I did some measurements that basically -- I performed those measurements.

I believe I remember seeing some of Ο. that, and we'll get it to later this morning. I think it was the like February 11 that you went back because there's a couple pages of handwritten notes.

Does that sound about right about the date?

> Α. That's right.

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- Ο. Why did you -- what triggered you to go back to Camp LeJeune to do those measurements you just referred to?
- A couple of things. If I recall, there were two affidavits that were basically produced after my report was submitted that described some witness of some operations at Camp LeJeune. And that was one element. And the other element was in the report of Dr. Sabatini, there was a general agreement on the methodologies I applied to calculate losses from the water, losses of the contaminant of concern from water that the parameters of was a disagreement with

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Dr. Sabatini, not the methodologies. wanted -- in particular there was a parameter that I wanted to establish, and I did that.

- When you went back on February 11, 2025, Ο. that was not the first time you had been on on board Camp LeJeune?
 - That was not the first time.
- Ο. If I remember correctly some old emails, which I can pull out if I need to, but I think you were involved in some issues related to advising on some remediation issues and were at Camp LeJeune sometime in 2005 for the first time.

MS. O'LEARY: Objection to form.

BY MR. DEAN: 14

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- Does that sound about right? Ο.
- I don't recall those. That's possible. In 2005 I was involved in work for the Department of Justice on issues at Camp LeJeune that it had nothing to do with this case. It was a different case or different cases. And that's what I recall.
- How many times do you think between 2005 Ο. and February 11, 2025, when you went back this most recent, how many times do you think you've actually been to Camp LeJeune, ballpark?

A. I believe my recollection is for	this
particular case here, I went to Camp LeJeune,	I
believe, three times. Before that, I don't	
recall, but it was more than once.	

- Q. We'll get to the billing records in a little bit, see if we can figure that out. But what you're telling me right now as best you remember is somewhere between August of '22 and today, you think you've been there approximately three times?
 - A. That's what I recall at this moment.
- Q. Had you spent the night in the area of Jacksonville, North Carolina while doing some work or meetings at Camp LeJeune those three times?
 - A. Not the three times.
 - O. At least once?
 - A. Yes.
- Q. So you've made three trips. One of those trips you stayed multiple days or at least two days?
- A. I think that's correct. One of the trip may have spanned over two days. I believe so.
- Q. Before February 11, 2025, had you gone to the Tawara Terrace water treatment plant and taken a look at it?

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A. Tawara Terrace treatment plant doesn't exist anymore. Anymore I want to add.

- Q. I understand. So you've never physically inspected personally from 2005 to 2025 the Tawara Terrace water treatment facility?
- A. Not the water treatment facility at Tawara Terrace because it was not there to be visited.
- Q. Do you know when the water treatment plant at Tawara Terrace was dismantled?
 - A. I do not recall when it was dismantled.
 - Q. But you've personally never been there?
- A. In the Tawara Terrace water treatment plant, I've never been in there.
- Q. And S.S. Papadopulos & Associates was retained in 2022 to work on this Camp LeJeune litigation case. You told me that earlier. Is that fair?
 - A. That's correct.
- Q. And is that first time that
- 21 Mr. Spilotopoulos started doing some work on this 22 case along with you?
- MS. O'LEARY: Object to foundation.
- 24 BY MR. DEAN:
- 25 Q. For this litigation case.

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1 MS. O'LEARY: Same objection.

THE WITNESS: For this litigation case,

- 3 | I was the one who was contacted. And I was
- 4 contacted to evaluate the work that had been done
- 5 by ATSDR and to basically evaluate whether or not
- 6 the data that was or the values that were
- 7 estimated by ATSDR would be quantitatively
- 8 reliable to provide reliable values for the
- 9 chemical of concern in the water supply. That, as
- 10 | I recall, was basically the task.
- 11 BY MR. DEAN:
- 12 Q. Dr. Spilotopoulos or
- 13 Mr. Spilotopoulos -- I can't remember if he's a
- 14 | doctor or not; I apologize -- he would have
- 15 started doing some work on this case, as far as
- 16 | this litigation case sometime in '22 along with
- 17 | you?
- MS. O'LEARY: Object to foundation.
- 19 THE WITNESS: It would have been a
- 20 | little bit after I was involved.
- 21 BY MR. DEAN:
- 22 O. Fair.
- 23 A. That's what I recall.
- 24 | Q. Between '22 and '25, did he make
- 25 | independent trips to Camp LeJeune separately from

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you, if you remember, or was he accompanying you on these two or three times that you went to Camp LeJeune?

- As far as he's concerned, you will have Α. to ask him. As far as I am concerned, he was there one time when I was there.
- Do you know whether he was able to Q. personally go take a look at Camp LeJeune Tawara Terrace water treatment plant between '22 and '25?
- Again, Tawara Terrace plant doesn't So he could not have visited it.
- Now, Hadnot Point water treatment plant Ο. have, you ever in the last -- since August of 2022, have you gone to the Hadnot Point water treatment plant and done any inspection or done any work there?
- Can you repeat the question? I didn't Α. catch the time.
 - Since August of '22. Ο.
 - Α. Yes. I have been there.
 - And when have you been that? Ο.
- 22 Every time I went to the base, I went to Α. 23 that plant.
 - So approximately three times? Ο.
 - Α. Approximately three times. That's what

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I recall, yes.

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- Q. And that includes two times before February of '25 and you also went a third time approximately -- we'll look at the records -- on February 11 of this year, you went back to the treatment plant?
- A. I went back to the treatment plant, and the other times I also went to the treatment plant.
- Q. The other two times -- again dates are not important to me -- was the plant operating?
 - A. Hadnot Point?
- 13 O. Yes.
- 14 A. Yes.
 - Q. Do you remember if those prior two occasions you did any inspections or take a look at the spiractors?
 - A. Every time I went to the plant, I did that.
 - Q. Now, who all from S.S. Papadopulos & Associates has done some work on this case along with you to support your work? I know about Dr. Spilotopoulos. Whom else?
 - A. There were others. I do not remember each one of them probably because there were quite

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1 a few, I suppose, but I can give you the one I remember.

- O. That's fine.
- A. Dr. Soderberg.

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- Q. Can you spell last name for us?
- A. S-O-D-E-R-B-E-R-G. He's a Ph.D. staff
 member. That would be one. Mr. Saul, S-A-U-L,
 Allen, A-L-L-E-N. That would be another one.
 - Q. Can you give a title or a position as we go through these? You said Dr. Soderberg. Is he a principal?
 - A. He's not a principal, but he's, I believe, an associate.
 - O. How about Mr. Allen?
- A. He's not a principal. He's basically our document manager.
 - Q. Before we go keep going through the list, what is your title at S.S. Papadopulos & Associates?
 - A. I am a senior principal.
- Q. How many senior principals are there at
- 22 S.S. Papadopulos & Associates approximately?
- A. Fully active, there are two.
- Q. And who are those?
- 25 A. The other one is Dr. Matt Tonkin,

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- Q. When you refer to yourself and Mr. Tonkin as senior principals, do you have an ownership interest or a share interest in S.S. Papadopulos & Associates?
 - A. I do.
- Q. And what is the nature of that ownership interest?
- A. The ownership structure at my company is basically you have two types. Every employee has some shares via what is called an ESOP, E-S-O-P, employee-owned stock partnership.
 - O. Yes, sir.
- A. Then you have the other ownership share types, which are basically -- it's a private company, and other ownership types which is basically -- I don't know how many people have such shares, but 10, 15 maybe.
- Q. So what is the nature of your ownership of shares in S.S. Papadopulos & Associates?
 - A. It's a minority position.
- Q. Can you quantify what that minority position is? So, for example, you said there's two principals, yourself and Mr. Tonkin.

When you say minority, I assume you both

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1 don't own 50 percent of the company; is that fair?

MS. O'LEARY: Object to foundation and

fair. 3

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THE WITNESS: That's fair. I want to -we are not the only two principals. We're the two full-time senior principals. You have additional senior principals who are basically retired, but still involved. And you will you would have that situation. And the ownership is basically

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distributed including those people. 10

11 BY MR. DEAN:

- How many is the total? Yourself and Ο. Mr. Tonkin or Dr. Tonkin. How many others are there that are principal shareholders?
 - Principal? Α.
- Yes, sir. Ο.
- 17 Well, you have the one who are semiretired. They would be senior principals at 18 19 least.
 - How many and who are they? Ο.
- 21 Α. Three.
 - Who? Ο.
- 23 So the first one, the oldest one, if you wish, is still there, still active, not in a full 24 25 time. It's Dr. Papadopulos. Dr. Papadopulos is

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the founder of the firm. He used to be at the USGS and basically started his firm in 1979.

The second one would be Mr. Steve

4 | Larson, L-A-R-S-O-N. He joined Mr. Papadopulos or

5 Dr. Papadopulos shortly after the firm started up.

6 And he also used to be at the USGS. Dr. -- Mr.

7 | Larson was basically working on the precursor of

MODFLOW at the USGS and did some recognized work

9 of that nature. And then he joined

10 Dr. Papadopulos.

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11 After that, maybe three or four years 12 later, I do not know exactly the timing,

Dr. Charles Andrews, A-N-D-R-E-W-S, joined the

company. And basically they are considered the

15 | three founders of the company.

Q. And they're semiretired, not full-time principals, I guess, is the best wait you

described them; right?

A. That's right. Different duties.

Q. So those five have a majority ownership interest together?

A. I do not believe so, but I don't know.

Q. Now, did either Dr. Tonkin or any of the other semiretired principals, Dr. Papadopulos,

Mr. Larson, Mr. Andrews, did any of them also work

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on any issue related to this litigation over the last three years and did some billing that you

3 | would know about?

MS. O'LEARY: Object to foundation.

BY MR. DEAN:

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- Q. Or is it just you?
- A. I do not believe that those persons have worked on this case.
- Q. So if I see your name on billing records or time records -- not your name, but it says senior principal and those hours that are attributable to that senior principal, the only person that would be to your knowledge would be referring to work yourself did?
 - A. I believe that's correct.
- Q. Now, other than Dr. Soderberg,
 Mr. Allen, who else has done some work on this
 case to support you?
- A. Right now I don't recall all of them, but, you know, for example, Mr. Cousin, Jim Cousin, C-O-U-S-I-N, has done some work. There are others, but I would have check the billing again if I wanted to know exactly.
- Q. What billing records would you have to check?

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- A. Well, I would ask admin to tell me who worked on that project probably, and I think they would be able to tell me.
- Q. They have to pull up some time records or a summary of time records to figure that out for you; right?
- A. I don't know exactly how they do it. I would expect an answer from them.
- Q. There's another name that I've noticed in some of the billing records for some travel whose last name was the same as yours.
 - A. Yes. That's correct.
 - O. And who would that be?
- A. Crystal Hennet, she's a Ph.D., and she's actually my wife. And on special times when I need support, she has on and off provided some support.
 - Q. What's her expertise?
 - A. She's a geoscientist.
 - Q. What is her title, do you remember?
- A. I do not know what her title would be, but she's a scientist, Ph.D. She would be an external associate, if you wish. She's not a full-time employee.
 - Q. So she's not a senior hydrologist or a

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- A. I do not know for sure. She could be a senior scientist.
 - Q. How about senior staff hydrologist?
 - A. I don't know.
- Q. So you don't know really as far as the folks that we've now discussed, four people, you don't know exactly what the billing records reflect their position to be specifically?

MS. O'LEARY: Object to foundation.

THE WITNESS: At present I do not.

BY MR. DEAN:

Q. Anybody else provide any additional support or work on Camp LeJeune that you haven't told me about that you remember as you sit there? I recognize you might have to look at some records, but we've talked Dr. Spilotopoulos and these other four.

Is there anybody else you haven't talked about that you remember?

- A. There are others, but specifically the name of them I would not remember right now.
- Q. How many employees today does Papadopulos & Associates have active?
 - A. Active I believe is 60 to 65.

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- Q. And are they all located in your offices located -- I believe it's Maryland, isn't it, the address, Rockville?
- A. No. They are not all located in Rockville.
 - Q. Do you have another office somewhere?
 - A. Yes, we do.

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- Q. Where is it?
- A. We have more than one.
- Q. How many offices does S.S. Papadopulos & Associates have, and where are they located?
- A. Well, we have one office in San
 Francisco. We have one office in Boulder,
 Colorado. We have one office in Waterloo, Canada.
 And I think that's it as offices are concerned.
 Some of our employees are basically remote, but those, I don't count those as offices.
- Q. I understand. Do those offices,
 San Francisco, Boulder, Colorado or Waterloo,
 Canada, do they focus on any specific area or
 region of work?
- A. The San Francisco office is more dealing with engineering and remediation type of issues, to my general knowledge, because I don't know everything. The same would be for the Waterloo,

Page 43 of 370

Canada office. And the Boulder, Colorado office is dealing mostly with water issues.

- Q. Let's go to your CV, and it's not -it's the first document, your CV, behind
 Attachment A, like about a third of the way
 through.
- MS. O'LEARY: Are you on Exhibit 3?

8 MR. DEAN: Exhibit 3.

MS. O'LEARY: If we have a stopping point sometime soon, we've been going for about an hour, can we stop soon?

MR. DEAN: Yep. Let me ask these next couple questions, and we'll stop.

BY MR. DEAN:

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- Q. Do you have your CV in front of you?
- A. I have the CV attached to my report in front of me.
- Q. I believe the CV, it was attached when the report was issued in December '24. My question to you is: Do you still believe that this CV is correct and complete, or is there anything you need to add to the CV?

MS. O'LEARY: Object to foundation.

THE WITNESS: Well, the CV is complete.

It contains examples of what I have done, not

Page 44 of 370

1 everything I have ever done.

BY MR. DEAN:

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- 0. Understood.
- As well as the CV is limited to Α. deposition experience for the last four years or five years, whatever.
- That's what I was going to ask you on Q. Then we'll take a break. this question. showing three depositions that you've been involved in over the last four years.

Has there been any others since December? Have you given a deposition since last December that this three would be incorrect?

- Α. Not since December.
- So the past four years, you've had three Ο. depositions. Have you provided some deposition or trial testimony before 2020?
 - Yes, I have. Α.
- Do you remember approximately how many Ο. times?
 - Depositions or trial --Α.
- Both. 22 Ο.
 - -- testimony. To the best of my recollection, over my career, that would include whatever is in the CV, I testified in court either

1 front of a judge or a magistrate about a dozen times. As far as depositions are concerned, the 2 best of my recollection would be about three dozen 3 times. 4

- Any trials since 2020? 0.
- No. It is not in my CV. I have no trials since 2020.
- I just wanted to to clarify and confirm. 8 9 MR. DEAN: We'll take a break right now 10 if you'd like.
- 11 THE VIDEOGRAPHER: We are off the record at 1004. 12
- 13 (Recess from 10:04 a.m. to 10:15 a.m.)
- 14 THE VIDEOGRAPHER: We are on the record 15 at 1015.
- 16 BY MR. DING:

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- 17 Let's jump to a little bit different new 18 topic. We may jump around a little bit today.
- 19 That's just how I roll. Okay?
- 2.0 What did you do to prepare for your 21 deposition today?
- Today basically nothing today. 22 23 prepare for the deposition, I did prepare, of course, but not today. Yesterday and before that. 24
 - Let's break it down. Who have you met Q.

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with in the past 30 days to prepare for your deposition?

- A. To prepare for my deposition I met yesterday with counsel, counsel who are present here today. And before that, we had conference calls, maybe two or three times, in which we did address some issues of deposition, but the conference calls were not uniquely on depositions. That is what I recall for the last 30 days.
- Q. Since July or August of '22, since you started doing work in this specific case, other than the Department of Justice lawyers, have you met or had any phone conversations with any Marines, Navy personnel, NAVFAC personnel, other federal government agencies to find out information or to have a conversation about something that might be needed for your work?
- A. Not that I can recall. Any such interaction would have been through counsel.
- Q. So, for example, I know you were at the base in May of '24. It's, in your opinion, report and it shows some photos and there's a little date May of 2024. I'm using that simply as an example so you understand where I'm going with this.

I'm just trying to find out if you

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1 interacted with any nonlawyers in the past two and a half years either, in person or by phone, about 2 issues related to Camp LeJeune. Counsel might 3 have been present. And I'm not asking what 4 necessarily was discussed. I'm trying to find out 5 if there was other individuals, nonlawyers, that 6 might have been at the May '24 inspection or that 8 you've had conversations with over the last couple 9 years. 10

- A. Counsel was always present during those visits, and there were people from the base that were there. And those people would be there to give us a tour and explain where we were and so on. They would occasionally answer questions that were asked.
- Q. So can we agree on this, that at least over the past two years, you don't remember having any phone calls with any nonlawyers for any purpose related to this Camp LeJeune work?
- A. There was no phone calls that would be with base personnel or so without the presence of a lawyer there.
- Q. That's what trying to figure out. Have you had any phone conversations in the past two and a half years for which a nonlawyer was on the

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phone representing the base or any U.S. agencies and DOJ lawyers were also on the call? That was my question, if you remember.

- A. I don't remember any.
- Q. Now, those several times you were on the base, you've indicated that there were some base representatives, nonlawyers that were present that you my question interacted with; right?
 - A. That's correct.
 - Q. Do you remember who they were?
- A. I do not remember who they were. I do not remember their names, perhaps with the exception of the one you mentioned before who I don't remember the name of right now.
 - O. Scott Williams?
- A. Scott Williams. Because he was there to basically provide a tour. Basically just the times I was at the base for this case, he was there for at least a part of it.
- Q. Let's talk about these visits on base as far as locations that you went. I've only been on the base I think once, maybe twice, and I went to something referred to as the cages or a cage. It was a big warehouse and it had some documents in it, some boxes and boxes of documents. I'm using

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Where on the base have you generally been to to do anything related to your work at Camp LeJeune to the best of your recollection on those three visits?

- A. To the best of my recollection, the visits all together included a thorough visit of a large portion of the base, where we were allowed to go because I believe that you may have sections of the base where you cannot go unless you have some clearance or something like that. That's what I recall. But we went to many places with basically a focus on the water treatment plant, the wells and issues that are basically of relevance to what I did.
- Q. So those three times, and just use this as an example, you'd pull up to the gate. Someone would meet you there, maybe Scott Williams or others. You'd all get in a car and you've ridden around Hadnot Point in a car; right?
 - A. In a bus.
- Q. In a bus? Car wasn't big enough for all the people; right?
 - A. At least on two visits.
 - Q. Rode around Hadnot Point observing

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whatever it may be that you all were looking at;
right?

- A. We were just basically just performing a site visit, that's right.
- Q. Do you remember getting off the bus to walk into a building to do any sort of an inspection or take measurements or do anything other than the water treatment plant?
- A. We were doing site visits, and that included going into certain buildings.
- Q. Do you remember which buildings you went into?
- A. I do not remember the number of the buildings. Each building has a number. The only one I remember is where we went to eat.
 - O. Where was that?
- 17 A. I think it was the officer compound.
 - Q. Do you know what Building 20 is?
- 19 A. Yes, I do.
- Q. What is Building 20?
- 21 A. That's Hadnot Point water treatment 22 plant.
- Q. Do you know what the Building 900 series are?
- 25 A. Yes, I do.

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- Q. And have you been to the Building 900, 901, 902, 903 area?
 - A. For this litigation, I have been not been inside those buildings.
 - Q. Did you go in any buildings while you were there for those three occasions to look at documents or to see if you could locate information that might be helpful to your work in the case?
 - A. I recall that we went into the building you're describing, I believe, before where you have basically locked documents, boxes of documents. I recall we went into that building.
 - Q. Did you go through any boxes, look at any documents and pull anything out or flag anything for someone to provide to you?
 - A. No.
 - Q. Now, we'll get to it in a moment about your reference list, and there's quite a lot of materials listed that. I guess why I'm asking it now is the only way in which you've received information and documents -- let's confine it to documents in this case is from the Department of Justice and their counsel?
 - A. For documents, I believe that's correct,

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for documents related to the base.

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- Q. Did you have any historical documents that you had prior to July, August of '22, any old files or old working documents, maps, whatever it may be, reports that you might have used prior to '22 that you used and looked at in this case?
- A. Well, my understanding is that all the documents that I had seen before for the base were included into what was basically available for this case.
- Q. So if it's on your reference list, it's complete as far as you know as you sit here today?
- A. What is on the reference list in my report is what supports my report.
- Q. Do you have other documents in your files or old computers at S.S. Papadopulos that related to Camp LeJeune that you have referred to, reviewed or relied upon that are not listed?

MS. O'LEARY: Object to foundation.

THE WITNESS: I do not believe so as far as the way the question was phrased.

BY MR. DING:

Q. The reason I ask it was just simply to make sure you and I understand one another and that your reference and reliance materials, which

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we'll get to in a minute, that list is complete and there's not something that's not on that list that's back at your office or on a computer that you reviewed that was maybe in a historical file that you already had and it's something that you've reviewed or relied upon that also supports and it's just not listed. That's why I asked you the question. Okay?

MS. O'LEARY: Object to form.

THE WITNESS: I understand the question.

And there is information that I collected after my report that we discussed previously that particularly is not in my report because it didn't exist at the time.

BY MR. DING:

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Q. Understood. Agreed. That's your supplemental materials, which we'll get to in a moment.

Other than that, you're not aware of anything else historical in your files that you reviewed or relied upon that are not listed?

- A. I cannot think of any documents that relate to the base.
- Q. So what do you consider or how would you define your expertise as a professional?

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- A. That is described in my CV.
- Q. Understand. Are you a fate and transport expert, groundwater expert, hydrologist?

 How would you classify your general area of expertise?
 - A. I am a geochemist. I have a hydrologist. I am a geologist. And in each of those disciplines, I have university degrees. That's basically what describes my education, if you wish.
 - Q. Your registrations and/or licenses are listed. There's two of them on your CV, geoscientist in Texas and a certified professional geological scientist for the American Institute for Professional Geologists; correct?

MS. O'LEARY: Object to foundation.

THE WITNESS: Licenses and certifications, I believe that's complete.

BY MR. DING:

- Q. And that's complete. So, for example, you're not a professional engineer and hold a professional engineer's license?
 - A. I am not a professional engineer.
- Q. Do you have you ever served on a peer-review committee?

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- Q. Are there any that you've served on that are related to any of the issues involved in this case related to water contamination?
 - A. It was related to water contamination.
- Q. What was that generally just so we have identification?
- A. For example, the one I am thinking and recalling right now was dealing with fuel issues and PCB issues at many sites.
- Q. What sites were they? What was the project referred to or the papers?
- A. It was an expert panel on that topic that dealt with groundwater contamination by fuel compounds as well as PCBs, and that was actually across the country along a pipeline that had basically stations. And most of the one where the issues were the most looked at, if you wish, was Pennsylvania. That's what I recall.
- Q. Did it have another location more specific than Pennsylvania that it was referred to?
- A. There would be many stations within Pennsylvania because the pipeline at the level of the entire country is basically, you know...

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- Q. Was that Hudson Valley?
 - A. That one was not Hudson Valley.
 - Q. Who was the committee that asked you to do the peer review for the one you're just referring to in Pennsylvania?
 - A. It was a panel that was doing actually peer review of what existed at the time as well as conducting some research for the panel.
 - Q. Did you do the report, do a report or is there anything that's publicly available about this peer review?
 - A. I do not know about publicly available. But there were several reports, and I was one of the contributors. I was not the only one on the panel.
 - O. Is it listed in your CV?
 - A. I believe it's with one of the clients listed there in the paper.
 - Q. Who was the client involved in the one you're referring to in Pennsylvania?
- A. At the time, I recall the client was Texas Eastern.
- Q. Are you a member of the National Academy of Engineering?
 - A. I am not.

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- Q. Have you ever served on any editorial boards for any publications?
 - Not editorial boards. Α.
- Now, remind me again when you first came Ο. to S.S. Papadopulos & Associates, the year approximately.
 - That was 1989. Α.
- So you've spent pretty much the entirety 0. of your professional career affiliated with S.S. Papadopulos & Associates; is that fair?
- As a consultant, that's correct. And Α. before that, I was in research more in the academic world, if you wish.
- Has all of your work for any issue going Ο. back as far as you can remember as far as compensation for services rendered by yourself been through S.S. Papadopulos? Let me tell you why I'm asking that.

Do you have any other entity that you own or affiliated with that has in the past done any work related to Camp LeJeune to your knowledge, or has it always been through S.S. Papadopulos & Associates?

MS. O'LEARY: Object to form.

THE WITNESS: It has always been through

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1 S.S. Papadopulos & Associates and the Department of Justice.

BY MR. DING:

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Q. So have you done -- let's use, for example, and we'll just talk 50,000 feet on the ATSDR water modeling and health studies at Camp LeJeune.

You know that there was a component of it that involved water modeling and then that water modeling component was then utilized on the health side to do some health studies.

MS. O'LEARY: Objection to foundation.

BY MR. DING:

- O. Correct?
- A. That's my general understanding.
- Q. Is this the first time you've done any work where you've looked at and reviewed and commented on the water modeling and how it may or may not impact activities on the health side, or is there some other projects you've have worked on in the past that are similar?

MS. O'LEARY: Object to form.

THE WITNESS: This case, this present case is the first time I was asked to evaluate the results of the ATSDR models both for Tawara

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Terrace and Hadnot Point as far as the reliability of the estimated values to be quantitatively used for this case.

BY MR. DING:

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- Q. Have you over the past two and a half years rerun any water modeling computer programs to do any water modeling of Camp LeJeune other than what might be identified, disclosed in your report?
 - A. I have not.
- Q. Do you know anybody at S.S. Papadopulos & Associates that's done any additional water modeling computer work related to Camp LeJeune at your direction or with your knowledge?
- A. I know that Dr. Spilotopoulos has basically run the ATSDR model as part of his evaluation of the models. We have two models. He did that. I didn't do that.
- Q. And do you have any comment about his work on that, or do you defer to him about his work and his opinions about it?

MS. O'LEARY: Object to form.

THE WITNESS: I have reviewed the model inputs and basically all the materials that are supporting the decisions or the assumptions that

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1 ATSDR has brought into the model, especially

- because there is very little data to predict what 2
- happened 35 years ago, 35 years before 1985. 3
- I have reviewed the parameters. I have compared 4
- the parameters in the models. I have done that 5
- because that's something I do as a geochemist. 6
- BY MR. DING:
- 8 Q. Any comment or opinion about those
- 9 reviews?
- 10 MS. O'LEARY: Object to form.
- 11 BY MR. DING:
- 12 Ο. You personally or do you defer to
- 13 Dr. Spiliotopoulos?
- 14 MS. O'LEARY: Object to form.
- 15 THE WITNESS: I have not run the models.
- 16 So I have no opinion or comment on that,
- 17 but I have reviewed.
- BY MR. DING: 18
- 19 Understood. Have you ever, yourself, Ο.
- 2.0 performed any historical reconstruction or hind
- 21 casting using any sort of groundwater modeling
- tools to reconstruct historical mean monthly or 22
- 23 concentration data?
- 24 MS. O'LEARY: Object to form.
- THE WITNESS: Well, there have been 25

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1 cases where a question like that will be asked. I

- 2 remember one case where I did participate and that
- 3 | was to reconstruct basically some certain
- 4 chemicals concentration, and that was based on
- 5 estimates. And I recall having participated to
- 6 that. And you had data and that was -- that's
- 7 | what I recall.
- 8 BY MR. DING:
- 9 Q. Do you remember the name of that project
- 10 or the client or anything like that?
- 11 A. I don't remember the details or the
- 12 | client of that, but it was related to uranium
- mining.
- 14 | O. Uranium mining?
- 15 A. That's my recollection.
- 16 | O. And location?
- 17 A. I believe it was in New Mexico, that
- 18 one.
- 19 Q. And timeframe, if you remember?
- 20 A. I don't remember the timeframe, but it
- 21 | was maybe 2000.
- Q. As a result of that work, was a
- 23 | concentration -- reconstructed values calculated
- 24 using that groundwater modeling work that you
- 25 | participated in?

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MS. O'LEARY: Object to form and foundation.

THE WITNESS: I was doing geochemistry in that, and I do not recall door if there was -there was no complex monitoring done. It was, you know, more like -- if I recall, it was a very large pile of tailings, and the question was, all right, where does it go from the tailings.

BY MR. DING:

Q. So go back to my first question and understanding what you just testified to about.

Other than Camp LeJeune work, have you ever worked on any other project whose goal was to determine and measure human exposure or dose to toxins and contaminants?

- A. Right now, I can not really remember specific ones, but as a geochemist, what my expertise is in is to understand the origin, fate and transport of contaminants in the environment. That's what I do basically. That's what I've been doing all my research years and professional years.
- Q. Have you ever in history utilized and relied upon the ATSDR water modeling results to support any work you've done in any other case or

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any other project?

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MS. O'LEARY: Object to form.

THE WITNESS: Could you repeat the

question? I missed the first part.

BY MR. DING:

- Q. Have you in any other historical activities prior to August of '22 ever utilized and relied upon the ATSDR water modeling chapters, conclusions and work to do work in some other matter?
- A. In other cases and this case, the ATSDR models were used by others. I was not tasked to review the model. And I may have cited to what ATSDR has done at the time without having had done what I have done for the purpose of this particular case, which was to evaluate whether or not the values or the estimated values that ATSDR is presenting with the model could be quantitatively reliable to provide concentrations of the chemical of concern in this case over a long period of time.
- Q. So go back to my question. My question -- I'll ask it a little different, because you seem to affirmatively say you've referred to it in the past and maybe cited to the

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1 | report in some other work in the past.

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Do you remember what occasions those were?

- A. I would have to look at it. There was a case that I did work. I don't remember exactly the timing of it, but I believe it's called the Washington case or something like this. And I worked on that. Because it was related to contamination at Camp LeJeune, I probably referred to the ATSDR work. But I had not done a review that I conducted for this as far as reliability of the work for quantitative views of concentrations in the context of this project.
- Q. We'll call it Washington, and we'll come back to it later in more detail. But you believe it's scientifically valid or you did at the time to cite to a -- cite to this ATSDR water modeling project or refer to it without ever having analyzed whether it was scientifically reliable at the time you relied on it?

MS. O'LEARY: Object to form and foundation.

THE WITNESS: Me citing to it, if I did, doesn't mean that -- doesn't mean that -- doesn't explain what I have done to review it. I just

1 mention that it does exist.

BY MR. DING:

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- Q. But you believe in the context of an expert witness it's okay for you to cite to, refer to, rely upon the ATSDR water modeling in this prior activity without knowing whether or not at that time it was scientifically reliable?
- MS. O'LEARY: Object to form and foundation.

THE WITNESS: It all depends what is the task and the purpose of the citation.

BY MR. DING:

- Q. Well, did you at the time -- who retained you in the Washington case?
- A. As I recall, it was the Department of Justice.
 - Q. Mr. Bain was your contact at that time?
 - A. Probably.
 - Q. Did you recommend in that case the need to analyze the model in order for you to provide a scientifically reliable opinion in the Washington case?
- A. Without seeing the report to refresh my memory, I don't know.
 - Q. As you sit there -- I'll show you the

report later on -- you don't remember advising

Mr. Bain at the Department of Justice the need for

you to do a deep dive into analyzing the model at

the time you were referring to it back then as

best you remember right now?

A. Again, I will have to see the report.

(Hennet Exhibit 4 was marked.)

MR. DING: For the record, I've handed the witness Exhibit 4, which are the billing records, I believe it's around 42 pages or thereabouts, received a week and a half ago and I've also supplemented Exhibit 4 and added the additional bill we received last night for February of 2025, so the record is clear. Okay? BY MR. DING:

- Q. I understand, obviously, March is not over with, so the March bill, invoice, time records, those haven't been finalized; correct?
 - A. Yes.
- Q. Now, a couple things I want to ask you about on these Exhibit 4 billing records. Take a look at the first page. In the top right-hand corner, it says the project name DOJ_CL_2022.

Do you see that?

A. I see that.

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Q		And	d tha	at's	what	you	refer	red	to	as	the
projec	t 1	name	for	your	and	the	S.S.	Papa	ador	pulo	າຣ
work o	n t	the (Camp	LeJe	une	liti	gatior	n sir	ıce	' 22	33

- A. That's an internal name.
- Q. Project number is 1817. And then it refers to a PO number. What does that mean? What does PO number mean?
- A. I guess it's a project order number.

 This number is probably from the DOJ. I do not do admin. So that's what I would guess.
 - Q. Is it a purchase order number?
 - A. I believe that would be right, yes.
- Q. Is there a document that's referred to as a purchase order that's got this number on it somewhere that ends in 502?
- A. Personally I don't know, but it must be because it is written here.
- Q. And did you gather that document and provide it to the Department of Justice?
- A. If it comes from the Department of Justice, I must have it. Personally, I do not to admin.
- Q. So you didn't and you don't believe admin sent that purchase order over to the Department of Justice in response to the subpoena?

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1 MS. O'LEARY: Object to foundation.

BY MR. DING:

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Q. Because you assumed they already had it?

MS. O'LEARY: Object to foundation.

THE WITNESS: I do not know.

BY MR. DING:

- Under the comments on the left side Q. there a little further down, it says DJ File Number. What does DJ stand for?
- I am not sure. I do not know. Again, Α. it is admin.
- Then it says DOJ contract Ο. #2W-CIV-03-0513. Do you see that?
 - Α. I see that.
- Is there a written contract of some sort Ο. that that contract number is referred to that's in possession of you or S.S. Papadopulos & Associates' records?
 - Probably. Α.
- Ο. Did you gather that contract and provide it in response to the subpoena and provide that contract to the Department of Justice to produce to me?
- My understanding is if it's contract with the Department of Justice as you describe it,

the Department of Justice has it.

- Again, I agree with you. You didn't, however, in response to the subpoena supply that document to the Department of Justice because you assumed they had it and would produce it if needed?
- MS. O'LEARY: Object to foundation.

BY MR. DING: 8

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- Ο. Is that fair?
- That would have been through admin, and Α. 11 I don't do admin.
 - Now, if we look down below this on the O. first page -- and if you want to, you can glance through -- we'll look at a few pages together. How about we just do it that way.

Do you see it says Professional Services, and under Employee Type there's some positions, for example, senior principal, but there's no names, specific names?

- Α. I see that.
- 21 And you told me earlier, as best you 22 know, you're the only senior principal. So when 23 it refers to senior principal, that would be Dr. Hennet? 24
 - Α. That's my understanding, yes.

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Q. And it says two hours. We don't know what you did for two hours looking at this document, but you did key in on a computer, timekeeping computer program what you did for those two hours?

MS. O'LEARY: Object to foundation.

THE WITNESS: Well, maybe, maybe not, because it's not done always the same way. And my recollections is our accounting system or the way we enter time has been basically changed or upgraded. It appears to be upgraded relatively frequently. So I don't remember the situation then.

BY MR. DING:

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- Q. Does Papadopulos & Associates send this one-page invoice that you see on Exhibit 4, that first page, because the second page is for a different month. Do you see that? The one on the back of the first page is a different month. So the one ending 9/21/22 is just a single page ending in Bates-stamp CLJA_SSPA_INVOICES_1. Do you see that?
 - A. You have to help me here.
- Q. Do you see that the invoice is a single page for the Bates-stamp that I provided?

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Page 71 1 MS. O'LEARY: You're on the first page 2 of Exhibit 4? 3 MR. DING: Yes. BY MR. DING: 4 Exhibit 4, page one is a single-page 5 Ο. 6 invoice? 7 MS. O'LEARY: Object to foundation. THE WITNESS: This is a single-page 8 9 document. BY MR. DING: 10 11 Is that for the month -- it's dated 9/21 0. and it says it's for services rendered through 12 August 31, 2022. Do you see that? 13 14 I see that in the middle there, yes. 15 And this is the first invoice you and I 16 are looking at that I have; correct? 17 MS. O'LEARY: Object to foundation. THE WITNESS: I will take your word for 18 19 it. 2.0 BY MR. DING: 21 Do you know whether or not when this 22 invoice -- it says it's being -- the client and 23 the address there at the top left is Branch Chief, Finance and Accounting under U.S. Department of 24

Justice. Do you see that, and an address, PO box?

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- A. I can read that, yes.
- Q. Is this one-page invoice the only thing that is sent to the Department of Justice for payment of this invoice, or does it have attachments when it goes that itemizes the time that's shown on the summary?
 - A. I don't know.
 - Q. Who would know that?
 - A. Admin.
- Q. The Department of Justice receiving this invoice would also know that, wouldn't they?
- A. I don't know.
- MS. O'LEARY: Object to foundation.
- 14 BY MR. DING:

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- Q. Do you understand it's your obligation as an expert as part of the federal rules to specifically provide open and complete information about your billing in a case like this? Are you aware of that?
- MS. O'LEARY: Object to form and foundation.
- 22 THE WITNESS: This is administrative.
- 23 BY MR. DING:
- Q. I'm asking you are you familiar with what's called Rule 26 and an expert's obligation

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to provide open and detailed billing records in litigation?

MS. O'LEARY: Object to form and foundation.

BY MR. DING:

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- Q. Are you aware of that?
- A. I am generally aware of Rule 26, but specifically -- but, you know, my firm gets a contract with the Department of Justice. I don't do the billing. So I don't know if it has one page, two pages or 20 pages. I do not know that.
- Q. Would you agree with me it's your obligation, all experts' obligations to provide as much detail and all information about their compensation and billing to the opposing side in response to what we refer to and you refer to as Rule 26?

MS. O'LEARY: Object to foundation.

THE WITNESS: I do not know. We do abide by everything because when you work with the Department of Justice, you have to abide by everything, and we do.

BY MR. DING:

Q. Now, if you look through these invoices or this one page, it says the initial budget at

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the bottom left-hand corner was \$100,000.

Do you see that?

A. I do.

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- Q. And then if you flip through it to the invoice that's Bates-stamped page 6, so there will be a 6 at the end of the page, do you see that the behind casting changed 611,664? Do you see that?
 - A. Where is it on the page?
 - Q. Bottom left, Project Summary.
 - A. Yes. I do see that.
- Q. Do you remember and can you tell me why it went from a \$100,000 budget to a budget of \$611,664?
- A. I don't recall the details of it, but this is typical of a project like this. The first phase is to evaluate, to do a first evaluation of an understanding what the cases is about, do a first evaluation of certain aspect of it. And I am typically required or requested, if you wish, to provide an estimate of how much it would cost to provide services.

And I do a best estimate by saying I would need a team to do this because I cannot do it all by myself. It's too many documents, too much to do. And then I provide my best estimate

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of how much it would cost.

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- O. To do XYZ?
- A. To do the project up to a certain -typically it's what will it cost for a year, for
 example.
- Q. Is there a document that you use to provide that estimate? Is it called a budget, or is it called something else?
- A. It is my budget estimate, and that's what my budget estimate is and I believe --
- Q. How do you transmit that budget estimate to the Department of Justice for approval? Is it a letter? Is it email? Is it a report? Is it a budget? What do you remember refer to it as?
- A. I do not recall about this one in particular. I do not recall how it was that. But obviously, it was transmitted to the DOJ whether by phone or by -- in some manner. Again, I do the budget estimate.
- Q. I think we've got enough here on this issue. Then I'll move on. You don't remember specifically the mode of the transfer of the information, whether it went from accounting, whether was a formal budget document, an email or a phone call, to provide the budget estimate of

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\$611,664?

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- A. I do not know the detail for this particular thing, but there is an estimate somewhere. And I am typically the one who would do such an estimate.
- Q. And does the process work you send the estimate over to the Department of Justice and they approve or sign off on it and then you proceed with whatever work that's been authorized?
- A. It's a budget request, and it is evaluated. And then if it was approved, we probably get a green light that it is approved. And then we'll probably have a meeting to explain what we thought should be done. And that's the way it works for most cases like this.
 - Q. Now, turn to page 19.
 - A. By that you mean the Bates number?
- Q. Yes, sir. Do you see at the bottom of the Bates-stamped page 19 the budget under Project Summary on the left at the bottom says \$611,664?
 - A. I see that.
- Q. Turn to the next page, 20. And does it reflect that the budget is changed between November and December of '23 to a budget an approved budget of the \$1,216,284?

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- 1 A. I see that.
 - Q. If you turn to page 25, Bates-stamped page 25, bottom left has that budget now in March of '24 increased to \$1,466,224?
- 5 A. I see that.

6 MS. O'LEARY: Object to foundation.

7 | BY MR. DING:

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- Q. If you flip to page 33 or Bates-stamped page 33. Let me know when you're there.
 - A. I see that, yes.
- Q. Under the Project Summary, column left has the budget now increased in September of \$1,716,284?
- 14 A. I see that.
- Q. If you turn to the top of page

 Bates-stamp page 37, on December 23, 2024, do you

 see under the column Budget on page 37 or

 Bates-stamped 37, the budget has increased to

 \$1,966,284?
- MS. O'LEARY: Object to foundation.
- 21 THE WITNESS: I see that.
- 22 BY MR. DING:
- Q. And that was approved by the Department of Justice at some point in time; right?
 - A. I suppose so.

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Q. If you turn to be Bates-stamped page 40.

- A. I am there.
- Q. On January 17, 2025, invoice No. 27034 at the top of the page Bates-stamp 40, did the budget increase to 2,216,275.50?
 - A. I see that.
- Q. And if you turn to the supplemental Bates-stamp and Allison, I don't know how you want me to refer to it. I made it as one exhibit. I don't know if you're going to Bates-stamp it 43.
- MS. O'LEARY: Can you refer to it by the invoice number at the top?
- MR. DING: I can do that.
- 14 BY MR. DING:

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- Q. The last page of Exhibit 4, the invoices, I received last night invoices 27513, and it's dated March 19, 2025. Do you see that on the first page?
 - A. I see that. That's a loose page.
 - O. Yes, sir.
 - A. It's not bound with Exhibit 4.
- Q. Well, it is part of Exhibit 4 for the record. I made it a part of it. It just doesn't have a Bates-stamp because Ms. O'Leary just provided it to me last night.

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MR. DING: We'll supplement it with the correct Bates-stamp once we get it. We'll supplement with Exhibit 4, if that's fair.

MS. O'LEARY: That seems fine.

BY MR. DING:

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Q. On the back of invoice 27513, it still reflects a budget of 2,216,275.50.

Do you see that?

- A. I do see that.
- Q. And it says that the budget remaining is only \$171,667.59. Do you see that?
 - A. I see that.
- Q. And this does not account for the work done in March by you, Mr. Spilotopoulos and any others that might have been working in March.

 That will come out of that remaining budget once we get the next invoice; right?
 - A. That's my understanding.
- Q. So my question to you to end this area of the deposition is: Have you prepared a budget estimate and provided it to the Department of Justice to provide for additional funding and/or budget for your work after this month?
- A. I've not done so because we still have money.

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- Q. Have you had any discussions with anyone about the needs for a future budget approval moving forward from today if this budget is used up this month?
 - A. I have not talked to anyone about that.
- Q. And you've not prepared anything about that?
 - A. I have not prepared anything about that.

 (Hennet Exhibit 5 was marked.)

BY MR. DING:

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Q. I hand you what I marked as Exhibit 5, and I'll tell you this for the record. Exhibit 5 I had to print it on larger paper so you and I -- with my advanced age, I couldn't see it on eight and a half by 11. So I had to print it on larger paper. Okay?

Are you familiar with a website known as USASpending.gov maintained by the federal government of the United States of America?

- A. I am not.
- Q. Do you see on Exhibit 5, the first page at the very top it says Active Filters. It says EPA -- it identifies the recipient as S.S. Papadopulos & Associates, Inc. Do you see that?
 - A. I see that.

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Q. And then down in the center, it gives you a prime award ID number, and there's about, I don't know, six or eight listed there. And out beside that is the recipient's name, S.S.

Papadopulos & Associates. And then the obligations are listed there in dollars and cents.

Do you see that column?

- A. I see that column.
- Q. Then there's some tabs you can click on. It talks about contract IDDs, grants, direct payments, loans and other.

Do you see those other tabs?

- A. No, I did not.
- Q. Although they're hidden, you see the little tabs beside the contracts?
 - A. Okay. Right on top there, yes.
- Q. If you turn to the second page on this USASpending.gov federal government website, do you see the awarding agency in the topic left-hand corner, it says Department of Defense and recipients is S.S. Papadopulos & Associates? Do you see that?
 - A. I see that.
- Q. Do you see the purchase order referenced there is just above that is listed as

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1 | W912DW11P0056? Do you see that?

A. I see that.

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- Q. And over on the right corner of that first block, do you see the start date of that contract was February 16, 2011?
 - A. I see that.
- Q. And this was for \$40,000. Do you see that?
 - A. Where is that?
 - Q. In the center there it says Current

 Award Amount. Do you see that, \$40,000 potential

 award amount?
 - A. I see that.
 - Q. And if you keep going down under the Award History, you see Action Date of 2/24/11.

 Amount is 40,000. To the right of that, it says Transaction Description: MODFLOW Model Recalibration.
 - A. I see that.
- Q. Do you know what this work was for for the Department of Defense that's being referred to there in 2011?
- A. I do not. I had nothing to do with this.
 - Q. Do you know what location someone at

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S.S. Papadopulos was working on in order to do some MODFLOW model recalibration work?

A. I do not.

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- Q. Turn to the next page of Exhibit 5, third page I think it is. Do you see the top left-hand corner there's a new purchase order number listed there of W912DW09P0253? Do you see that?
 - A. I see that.
- Q. And the awarding agency is the Department of Defense. Do you see that?
 - A. I see that.
- Q. The start date of the project was September 18, 2009.
 - A. I see that.
- Q. The amount that was obligated or potential award amount was \$66,500. Do you see that?
 - A. I see that.
- Q. By the way, if you go back to the top out to the right, far right of the purchase order number, does it show the word "Completed"?
 - A. I see that.
- Q. Now, if you go to the section under the Award History, do you see the Action Date, the

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1 | first one listed there of 9/18/2009 for 22,000?

- A. I see that.
- Q. To put in context just for dates, Tawara Terrace report by ATSDR was released in 2007; correct?
 - A. I believe it's correct.
- Q. And the National Academy of Science released an alleged review of that report in July, I believe, or August of 2009. Do you remember that? I'm not going to hold you to the specific date. But the National Academy of Science released an alleged review of the ATSDR report in the summer of 2009.
- MS. O'LEARY: Object to form.
- THE WITNESS: I will take your word for
- 16 it.

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- 17 BY MR. DING:
- Q. Do you see -- who is Howard Hanson?

 Excuse me. Not who. Where is Howard Hanson Dam?
- 20 A. Howard Hanson? Where is that?
- Q. In the center of the webpage or the document, out beside 9/18/2009 and 22,000, it says groundwater model. Independent technical review, ITR, right the abutment integrity, Howard Hanson Dam. Do you see that?

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1 A. I see that.

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- Q. Do you know what that's referring to and were you involved?
 - A. I was not involved.
- Q. And you don't know what it's referring to?
- A. I do not know what it is referring to.
 - Q. Turn to the next page. I guess we're now on page 4; right?
- 10 A. You are right.
- Q. Do you see the purchase order at the top is 15JCIV22P502?
- 13 A. I see that.
- Q. And out to the right, it says in progress. 9 months remaining.
 - A. It says "Nine months remain."
- Q. Excuse me. "Nine months remain." Do you see that?
- 19 A. I see that.
- Q. And it shows the start date of this contract with the Department of Justice as the awarding agency was July 21, 2022.
- Do you see that, top right-hand corner?
- A. I see that.
- 25 Q. Now, that purchase order number ending

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in 502, would you go back and look at Exhibit 4
and tell me if that's not the exact same purchase
order in your very first invoice number 1?

On exhibit, 4 Bates-stamped first page

1, up in the topic right-hand corner, it says PO

Number. That is the exact same number I just read
you to ending in 502 that is on page 4 of

Exhibit 5; is it not?

- A. Both numbers or whatever codes are the same.
- Q. Thank you. Now, does it show in this Award Amounts that the obligated amount currently is 2.2 million? Do you see that?

MS. O'LEARY: Are we back on Exhibit 5?
MR. DING: I'm sorry. Exhibit 5.

BY MR. DING:

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- Q. Back on Exhibit 5 on page 4, the

 Department of Justice purchase order page, does it

 show that the current award amount is the

 2.2 million?
 - A. Yes. I see that.
- Q. And that number under Potential Award
 Amount several lines down, do you see it's
 2,216,275.50, and that's consistent with the very
 last page of invoices that we reviewed from

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1 | Exhibit 4. The March invoice I received last

2 | night has the same number. Do you agree with

3 | that?

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4 MS. O'LEARY: Object to form, just to

5 clarify what you mean by March and February.

MR. DING: The March I received last

7 | night dated March 19, 2025.

8 THE WITNESS: I see that. Those numbers

9 | are the same.

- 10 BY MR. DING:
- 11 Q. Now, under the Award History --
- 12 A. By the way, when we are done with this,
- 13 I would like to take a break.
- Q. Yes, sir, no problem. We'll be there
- 15 very soon.
- Under the Award History, you see that
- 17 | first entry modification, it says zero at the
- 18 | first line there. And then it's got an Action
- 19 Date 7/21/2022 and \$100,000. Are you with me?
- 20 A. I'm with you.
- 21 O. Then there's a modification number. The
- 22 | first one says P1. If you look under it, there's
- 23 additional P1, P2, 3, 4, P5 and 6. Do you see
- 24 that?
- 25 A. I do see that.

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- Q. Now, if you scroll over to the right under Action Type, does it say Change Order out beside the one that says P1?
 - A. It says that D column Change Order.
- Q. Is the change order the estimation document you referred to earlier that's sent over Department of Justice to get approval for additional work, or is that a different document?

 MS. O'LEARY: Object to foundation.
- A. I believe it must be similar or the same. I don't know.
- Q. Who would know that? Someone in your office, admin, or the Department of Justice?
- A. I personally do not know if this is what you say it is or not.
- Q. Turn to the next page. If you want to take a break now and then come back to the exhibit, that's fine with me. I may have more than five minutes left on these last two pages.
 - A. Take a break now.
 - O. That's fine. Go off the record.
 - A. Coffee is working.
- Q. Yes, sir. Understood.

THE VIDEOGRAPHER: We are off the record at 1123.

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1 (Recess from 11:23 a.m. to 11:32 a.m.)

THE VIDEOGRAPHER: We are on the record

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BY MR. DEAN:

Q. Dr. Hennet, we've been going for about a couple hours, a little over two hours. We had a couple breaks during the day.

Have you discussed -- had any discussions with the Department of Justice lawyers at all?

- A. We just chatted on things that have nothing to do with the deposition.
- Q. Thank you. Now, if you turn to, for the record, page 5, the last two pages -- this is a six-page document -- the last two pages, 5 and 6, do you see recipient is identified at the top as Papadopulos & Associates, Inc.?
- A. I'm confused about what is 6 because the last two pages or double sided.
 - O. Yes, sir.
- A. And you say the last two. So is this one or this one?
 - Q. I'm sorry. Good point. We'll just stay on that page 5 for right now. Do you see on page 5 at the top it says Recipient under the Active

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Filter is S.S. Papadopulos & Associates do you see that?

A. I see that.

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- Q. And do you see that in the center of the page there, and it's the tap that's opened says Contracts, and then it says Prime Award ID under that?
 - A. I see that.
- Q. And you see from there all the way to the bottom of page 5, there's a list of different award IDs for different contracts, and out beside that is S.S. Papadopulos & Associates and an obligated amount? Do you see that?
 - A. It says Obligations.
- Q. Thank you. It says obligations and then under that is Amounts; right?
 - A. I see that.
- Q. If you turn to page 6, the next page, the contracts continue with the same information we had on page 5. Do you see that?
- 21 A. It appears to be a continuation of page 22 5.
 - Q. If you go to page 7, do you see the same where it lists the awarding agency as the Department of Justice, the recipient, S.S.

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Papadopulos & Associates up at that top as far as active filters? Do you see that?

A. I see that.

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- Q. And on page 7 you see a list of awards, prime awards for contracts with the Department of Justice with the recipient S.S. Papadopulos & Associates, and then there's an amount over in the Obligations section next to each one of those contracts? Do you see that?
- A. Yes. To make sure, page 7 is the one before the last?
- Q. Yes, sir. As a matter of fact, the very first one listed there is that same one that we're here about, which is our case, the award ID is identified as 15JCIV22P502, which is the name number you and I have looked at on the invoices for your work on this litigation; right?
 - A. It appears to be the same number, yes.
- Q. And the obligated amount are lining up as the \$2,216,275.50; right?
- 21 A. That to my recollection is the same 22 amount, yes.
- 23 (Hennet Exhibit 6 was marked.)
- 24 BY MR. DEAN:
 - Q. Now, I'll show you what I've marked as

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1 Exhibit 6. For the record, Exhibit 6 is an Excel spreadsheet created by my office after clicking on 2 all of those contracts on all of pages that you 3 and I just went the over on Exhibit 5, and if you 4 see I've added the award ID number at the top. 5 6 I've added the column for Total Obligated Amount. I've added the Award Date that's listed in the government's database on USASpending.gov. 8 9 added the Period of Performance start date column and the end date, the Awarding Agency and the 10 11 Funding Agency, and they're all listed as 12 Papadopulos & Associates.

Do you see that Excel spreadsheet that I created?

- A. I see the Excel spreadsheet. I didn't really follow everything you said.
- Q. I understand. I'm just laying what lawyers call a foundation so understand where this document came from. I created it based on the information that's on the website for the USASpending.gov.

Do you see that?

- A. Right here I have no possibility to check that.
 - Q. I understand that. I'm representing to

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you that the information on Exhibit 6 came from the information on the website shown on Exhibit 5. Okay?

> Α. Okay.

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Now, do you remember me asking you about 0. when you started doing work on this case? me.

Do you remember me asking you about when you started doing any work associated with Camp LeJeune?

- I believe you asked me a question like Α. that.
- And you told me something along the Ο. lines you couldn't remember the exact date, but it was sometime you thought in 2005.
 - Approximately, yes. Α.
- If you look at the second entry there, Ο. do you see the one that ends in 66 in the first yellow mark, Obligated Amount was \$45,634.10 and it said the period of performance start date was 11/30/2005 and that the awarding agency is the Department of Justice?
 - Α. I see that.
- And does that sort of refresh your 0. recollection about the approximate timeframe of

	Page 94
1	starting to do work with Papadopulos & Associates
2	at Camp LeJeune somewhere in November of 2005?
3	MS. O'LEARY: Object to foundation.
4	THE WITNESS: I have no clue if this
5	represents work done at Camp LeJeune or not.
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7	(Questions on Exhibt 7 bound separately.)
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BY MR. DEAN:

Now, going back to Exhibit 6, the Excel 3 0. spreadsheet that I prepared and that first one 4 first yellow entry that you and I were just 5 6 talking about, does that now refresh your recollection that the \$45,634.10 under that award ID DJJ6WENR010066, showing the awarding agency 8 9 Department of Justice and the recipient as S.S. Papadopulos & Associates is the project for which 10 11 you first began working at Camp LeJeune in 12 November 2005 more likely than not? 13

Object to foundation. MS. O'LEARY:

THE WITNESS: I don't know. It could

I don't know. be.

BY MR. DEAN:

Fine. If we go down, and I'm not going Ο. to go into every single one of these, but do you see a number of entries between 2005 and all the way on the backside -- if you turn it over, you'll see more entries that go through -- the last one is listed as ending in 49 for \$494,846 for some work for the EPA with a start date of 9/30/2024? Do you see that?

Α. I see that.

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- Q. And if you total up -- before we go there, the one for the Department of Justice that we've been talking about, the last invoice page number, Exhibit 4, remember we talked about there was a \$2,200,000 budget and we had used up about 1.9, and there was 178,000 or thereabouts left over. Do you remember that?
 - A. I remember that if that's what you are talking about, the last page of Exhibit 4.
 - Q. If you turn over to page 2 of my Exhibit 6, about the sixth entry there is where the 15JCIV22P502 purchase order is listed and it's got that amount we've been talking about, 2,216,275.50. Do you see that?
 - A. I see that.
 - Q. The \$2,216,275.50 is money that

 Department of Justice has paid your firm or is

 obligated potentially with a budget from July of

 '22 to present?
 - A. That's my understanding.
 - Q. However, we know that the Department of Justice and yourself started doing some work at Camp LeJeune, like we've already discussed, beginning in 2005; right?
 - A. Yes. Whether it began in 2005, about.

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Q. Not a specific date. There are amounts there for the Department of Justice listed for contracts, 45,634. We can go to the next one. It says 40,000. It was 2007 work. Skip the next one, it was EPA, and we go to some work that was done for the Department of Justice in February of 2009. That had a \$440,096 payment, do you see that, or obligation?

MS. O'LEARY: Object to foundation.

THE WITNESS: I see that.

BY MR. DEAN:

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- Q. So the point I'm making, and you'll probably agree now that we've gone through this, the amount the Department of Justice has paid Papadopulos & Associates for all of its work at Camp LeJeune since 2005 is an amount in excess of the current obligated \$2,216,275.50. Can we agree on that?
- A. I do not agree in the sense that not at all of the Department of Justice cases we're talking about here have to do with Camp LeJeune.
- Q. I don't disagree with that. But some of these invoices and contracts, were they to be produced, would show us, for example that very first one, the 45,634.10 for the November 2005

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work, it would show some of these that would be
work at Camp LeJeune more likely than not;
correct?

MS. O'LEARY: Object to foundation.

THE WITNESS: I don't know. I don't to admin, but probably.

BY MR. DEAN:

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Q. Now, if you turn to the second page, just to finish up this line of questions, do you see that all of the total obligated contracts that are listed on my exhibit that I received the information from USASpending.gov, part of the federal government's website, shows that of all of these agencies, Department of Justice, the EPA, General Services Admission, Department of Energy, are currently or in the past with a potential total value of awards to your company of \$137,244,621.84 if my math is correct in column 3 on the second page?

MS. O'LEARY: Object to foundation.

THE WITNESS: If your interpretation is correct. My understanding is that does include -- most of those are not litigation projects. I am not involved, but I know that we work for the Hanford site, for example. And I know that we

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work for EPA Region V. I am not involved. I know that we do work for the government.

And over the yours, it has been maybe in the 10, 15 percent of the business that my company performs service for. I personally am only involved in a subset of those, and that would be through the Department of Justice.

BY MR. DEAN:

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- 0. So let me finish this up with this The total amount that's paid out for question. all of those various contracts that you just mentioned that has a potential subtotal award of \$137,244.621.84, as a shareholder, you would financially benefit at some potential percentage, whatever your share interest is, with whatever those government contracts are that are paid by these different agencies, including the Department of Justice?
 - MS. O'LEARY: Object to foundation.

2.0 BY MR. DEAN:

- Whether you were involved that the Ο. project or not, you would personally financially benefit from all these projects; correct?
- Same objection. MS. O'LEARY:
- 25 THE WITNESS: If the company does well,

1 I do well as well. Like every employee, we all participate. But I want to make one correction 2 here. A potential award is not the same as 3 basically what was actually done. 4

BY MR. DEAN: 5

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- Ο. Understood.
- Α. And I'm not finished. And the potential award sometimes in some of those projects, not the one that I have been involved in, includes subcontracts that can be substantial because -that's all I can say about that because I don't know the details of all of those contracts.

(Hennet Exhibit 8 was marked.)

BY MR. DEAN: 14

- Understood. I'm going to show you 0. Exhibit 8. I'm going to represent to you this is the metadata from the billing production in this case from you, and you see it indicates there the Bates number is CLJA_SSPA_INVOICES_1 through 42. Do you see that?
 - At the bottom there I see that. Α.
- You see the file name for this Ο. particular file was named by somebody 1817 invoices through 11125 without backup.pdf.

Do you see that.

- Α. I see that that.
 - What does backup mean? Ο.

MS. O'LEARY: Object to foundation.

THE WITNESS: I don't want to speculate,

but it seems that -- I don't know what it means. 5

It may be reflecting some notes. For example, if

I enter -- today I will enter in my time sheet

eight hours, whatever it is, and say deposition or

9 something like that.

BY MR. DEAN: 10

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11 You're not a computer person nor admin O. person at the office, but someone would have those 12

13 backup records indicating what work was being done

and when that serve to create those invoices that 14

- 15 I previously showed you?
- 16 I suppose so, yes. Α.
- 17 (Hennet Exhibit 9 was marked.)
- BY MR. DEAN: 18
- 19 I'm going to show you Exhibit 9.
- 2.0 Exhibit 9, you see that it's a January 2010
- 21 publication from the United States Department of
- Justice, Executive Office for Attorneys. 22
- 23 down, it appears to be some sort of a bulletin,
- United States Attorneys bulletins of some sort. 24
- 25 Do you see that?

1 MS. O'LEARY: Object to foundation.

THE WITNESS: I don't know of some sort,

what you mean by that.

BY MR. DEAN:

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Can we agree at least on the left-hand Ο. side, it says January 10, Volume 58, Number 1, under that United States Department of Justice Executive Office for the United States Attorneys, Washington, D.C., H. Marshall Jarrett, Director. Then under it says, "Contributors' opinions and statements should not be considered an endorsement by EOUSA of any policy, program or service. The United States Attorneys' Bulletin is Published

Do you see that?

Pursuant to 28 CFR Section 0.22(b)."

- I see that. Α.
- Then at the top of the document, page 1, Ο. it says Expert Witnesses. Do you see that?
- Α. Yes
 - Ο. The first one says, "Considering the proposed changes to Federal Rules of Civil Procedure regarding expert witness discovery by Adam Bain."

Do you see that?

Α. I see that.

1 Q. Then under that it says, "Working With The Expert Witness Perspective, by Remy 2 Lawyers: J.C. Hennet, Ph.D." 3 4 Do you see that? I see that. 5 Α. Did you participate and work at some 6 Ο. 7 point in time to prepare a journal article for the Department of Justice back in 2010 by that name? 8 9 Yes. I recall it was an invited paper, and it was invited to be included in there. 10 11 don't remember exactly the detail of it. I will 12 have to read it. 13 Do you see that on page 5 -- it's a black and white document, but you can see there's 14 15 some highlights that's been added to the document. 16 Do you see that in the center about Rule 17 26 trial preparation, protection for communications it party's attorney and expert 18 19 witnesses? 2.0 So you see that section?

MS. O'LEARY: Just for the record,

you're referring to the graying as highlighting?

MR. DEAN: Yes, ma'am.

24 BY MR. DEAN:

Q. Do you see that grayed area?

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Α.	I	see	some	gray	area,	but	I've	not	read
it yet.									

Q. I'll read it with you and read it for you. It says, "Rules 26(b)(3)(A) and (B) protect communications between a party's attorney and any witnesses required to provide a report under 26(a)(2)(B) regardless of the form of the communications, except to the extent that the communications (i) relate to compensation for the expert's study or testimony."

Do you see that?

- A. I can read that, yes.
- Q. Now, if you turn to your section which begins about page 14 of the document. Down at the bottom left-hand corner are the page numbers. Do you see that?
 - A. I do see that.
- Q. Is this the section that you wrote, which is about four pages long in January 2010 published in this bulletin?
- A. I take your word for it. I mean, I know I did contribute to this. I don't see -- I have not read it for more than 10 years I am sure. So I don't recall exactly what is in it, but it appears to be what I contributed upon an

2.0

invitation to contribute.

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Q. And do you say in the first full paragraph on page 16, "The expert witness is often publicly stigmatized as ethically comprised considered by some as nothing more than hired gun"?

Did I read that correctly?

- A. You read that correctly.
- Q. It goes on it says, "The stigma is borne from misconceptions and from unavoidable human nature. The concept that anyone who charges which high hourly rates would say anything to satisfy the paying party along with a few well publicized examples of professional misconduct server to anchor the stigma. In reality, the enduring expert witness must demonstrate strong professional and ethical conduct."

Did I read that correctly?

- A. You did.
- Q. Do you see at the next to last sentence at the bottom, it says, "Opinions of the court and transcripts of depositions and trial testimony constitute a public record. That record serves as an effective quality control tool that lawyers and the finders of fact can consult. To succeed as an

expert witness, credibility and thoroughness have to complement education and experience."

Did I read that correctly?

A. You did.

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Q. If you turn to page 17, the next page, and this is last page of your section, does it say, "First, for expert testimony, it is important to," and you listed a bullet point of a number of things there, do you remember?

Do you see that?

- A. I don't remember, but I see that.
- Q. And then you've got, "Second, for a successful lawyer-expert relationship, is important for the expert to." And can you read into record the last bullet point that you wrote?

MS. O'LEARY: Object to foundation.

THE WITNESS: The blast bullet point reads, "Keep track of the budget since it can be a limiting factor."

BY MR. DEAN:

- Q. What did you mean by that?
- A. It is important for what I do as a professional to make sure that the client is aware of the degree of effort and cost of a project. So it is important to follow how much money is being

billed. And some projects may have -- when you have a budget, you have a budget. And if you go above budget, you may not be paid.

Q. But you do believe and you wrote in your article that it's important in order to maintain your integrity as an expert witness that you're thorough and provide truthful accurate information in those situations?

MS. O'LEARY: Object to foundation.

THE WITNESS: Yes. As an expert witness, I just follow those ethical rules and answer to the best of my recollections and ability. I am doing that here.

(Hennet Exhibit 10 was marked.)

BY MR. DEAN:

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- Q. I'll show you what I'll mark -- I'll show you Exhibit No. 10. And we're going to use the TV in just a second and try to get through this, if we can, by lunch. I don't know. We'll see if we can. We're going to turn now to your reliance materials list and supplemental materials that you provided to the Department of Justice to produce in this case in the last few weeks. Okay?
 - A. Let's see.
 - Q. I'm going to show you Exhibit No. 10.

1 MS. O'LEARY: Is all of this 10?

2 There's several loose papers.

> MR. DEAN: Yeah. I was going to make it all one exhibit. I'll go through and identify just so it's clear on the record what we're doing.

6 BY MR. DEAN:

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- Do you see there's a cover letter from Q. Ms. O'Leary, dated February 25, 2025. I'll read into the record what it says. It says, "Counsel, pursuant to Federal Rule of Civil Production Number No. 26(e)(1) & (2), the United States now produces supplemental facts and data considered or relied upon by Dr. Hennet."
 - Do you see that?
- Α. I see that.
 - Now, do you agree with her, this is the Ο. way she wrote the letter, that these are new facts and new data that was considered by you after your report?
- MS. O'LEARY: Object to foundation.
- 21 THE WITNESS: I believe it relates to
- 22 what I did on February 11.
- BY MR. DEAN: 23
- 24 Which is after your original report in December of 2024? 25

- Α. That was after my expert report, yes.
- And then the second part of Exhibit 10 Ο. is an errata sheet -- actually, it's a couple pages -- that relates to some updates, changes or corrections that you wanted to make to your report footnotes.

Do you see that?

MS. O'LEARY: Object to foundation. have two pages of errata. Am I meant to have two? MR. DEAN: I agree with that, one on the 25th and one on the 28th.

BY MR. DEAN:

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- Ο. Do you have the errata sheets there?
- I have Exhibit 10. Α.
- Hand it back to me, and I'll see if I Ο. can help find where it's at in the group here. At the end there's two pages. So there's three sections to this. Exhibit 10, first page, one and two are two letters, February 25 and 28. second section of Exhibit 10 is your supplemental reliance materials list that came with these The last thing is the errata sheets, two letters. pages of errata sheets that came with the letter on the 28th.

MS. O'LEARY: I object to foundation

1 I don't think both errata came with the letter, either letter from February. 2

MR. DEAN: What's that?

MS. O'LEARY: I don't think both errata came with the letters from February.

BY MR. DEAN:

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If you look on the backside of the first Q. page there, you'll see a second letter, dated February 28, and then the last sentence says, "Also produced are errata correcting citations to Bates-stamped documents with the prefix."

Do you see that?

- Which date of which letter because I Α. don't know which page -- the second page.
 - Yes. Ο.
 - February 28, 2025. Α.
- Does it say in the second sentence, Ο. "Also produced are errata correcting citations to Bates stamps"?
- 2.0 MS. O'LEARY: Object to foundation.
- 21 THE WITNESS: Bates-stamp documents with
- 22 the prefix.
- 23 BY MR. DEAN:
- 24 Errata sheets. 0.
- 25 Α. So it's not full sentence you gave. But

1 I can see what you say.

- And do you see at the end of Exhibit 10, the last two pages of Exhibit 10 are those two errata pages?
- MS. O'LEARY: Object to foundation. 5

THE WITNESS: The last -- you have one 6 7 page that is two sides and one page that is one side. 8

BY MR. DEAN:

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- Ο. Agreed.
- And it is a three pages or four Α. depending on how you look at it.
- Ο. But those are errata sheets that you created subsequent to your report to make some minor changes to some references in footnotes; right?
- Appears to be, yes. It appears to be that.
- Now, the other section of Exhibit 10 Ο. that I want to spend most of the time with you is it titled Supplemental and Corrective Reliance List. Do you see that?
 - I see that. Α.
- Did you prepare this document or someone 0. work with you to prepare the supplemental

corrective reliance list?

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- A. My recollection is that it was -- I delegated this could be done by a staff to basically get those things with the errata incorporated. That's my recollection.
- Q. And it also was to list the photographs and handwritten notes of February 11, 2025 when you made that third visit, and those are listed in here too as well; right?
- A. I do not know that. You have to show me where they are listed.
 - Q. Sure. Do you see on page 24?
- A. 24 of the second section of the four-section exhibit?
- Q. Exhibit 10, yes, sir. Turn to page 24 at the bottom. Do you see in the center it says CLJA Photos SSPA 1 through 58, Bates stamps CLJA Photos SSPA 1 through 52.
 - A. I see that.
- Q. Is that photos you believe to be that you took -- scratch that. I'll show them to you in a second. Turn to page 28.
 - A. Yes.
- Q. Do you see the last entry there is called Hennet USA 1 through 96?

1 Α. I see that.

(Hennet Exhibit 11 was marked.)

BY MR. DEAN:

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- I'll show you Exhibit 11. Do you see 0. that Exhibit 11 are your notes, sheets one and two, you prepared it appears on February 11, 2025. The Bates-stamp of this exhibit is Hennet_USA_34 and Hennet_USA_76. Do you see that?
 - Α. I see that.
- So that is part of the reason for the Ο. supplemental reliance materials in addition to the errata changes, was also to provide these updated supplemental documents and data.

Do you see that?

MS. O'LEARY: Object to foundation.

THE WITNESS: I see that.

BY MR. DEAN:

O. Now, what we're going to do, just so you know -- you can put that aside for the time being. Let me ask a couple more questions.

We talked about it earlier, but the supplemental reliance materials that are listed, I noticed that pages 1 through the middle of page 22 you listed out a lot of different specific materials. You've provided whether it be an

author or whether it be a Bates-stamp, whether it be a JTC Environmental Consultant report, you listed out a lot of things individually on pages 1 through 22.

Do you see that?

- A. I see that.
- Q. Then the last, page 22 through 28, there's a lot of documents listed, which appear to be a lot of the production's Bates-stamps in this case.

Do you see that as well?

- A. I see that.
- Q. I guess my question is to understand how you may have prepared this list and did your work.

The first 22 pages where you specifically list out things, are those all of the documents, individual documents that you specifically rely upon for your opinions in this case?

MS. O'LEARY: Object to foundation.

THE WITNESS: Those are the documents that I provide in support of my expert report plus what you mentioned that I did after my expert report.

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1 BY MR. DEAN:

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- February 11? Ο.
 - Α. February 11, yes.
- The documents that are listed in pages Ο. 22 through 28, and I'll just give you an example, if you look at page 23 and let's go down to the third entry CLJA OCPL 1 through 12, do you see that?
 - Α. I see that.
- Can you tell me as you sit here what Ο. specifically those documents are?
- Α. I cannot.
- If there's anything in there that's Ο. important to your opinions and that you reviewed and relied upon, it's going to be in the first 22 pages?
- MS. O'LEARY: Object to form and foundation.
- THE WITNESS: I wouldn't agree with that without seeing those other documents.
- 21 BY MR. DEAN:
 - Well, have you looked at every single Ο. page of every single one of these groups of millions of documents on pages 22 through 28? Under oath, had you reviewed every single page of

every single one of these productions?

MS. O'LEARY: Object to form.

No. I didn't review every THE WITNESS: page, but I basically went through a lot. And I may have missed some, but what was relevant to what I did I basically ...

BY MR. DEAN:

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- And you feel like you did a very Ο. thorough review of all these materials that are grouped together on pages 22 through 28?
 - I did as best I could. Α.

MS. O'LEARY: Object to form.

BY MR. DEAN:

- And those that you found that were Ο. relevant to your opinions, you pulled them out and you've listed them on the first 22 pages that are cited in your report or referred to?
- I do not think that reflects that. Α. in the report itself, you have footnotes. something is specifically relevant, I would cite. Now, on the list of documents considered and/or relied upon, I listed basically what I have.
- Let's do this. I don't know if we can Ο. I doubt we can finish, but we're going to try. Your photographs.

Well, let me ask you this: Is there some new opinion you now have as a result of the supplemental work that was done on February 12, or does this information just support some of your prior opinions?

- A. You mean February 11?
- Q. Yes, sir. I'm sorry.
- A. No. My opinions are unchanged.
- Q. So am I accurate that the work you did you believe supports what you've already said. You don't have any sort of new opinions?
 - A. Support or confirm.
- Q. Did you create some new calculations to confirm for support some prior opinions that you expressed on or after February 11, 2025?
- A. I didn't do calculations per se, but I just basically thought about what I observed on February 11, especially under filling of the water buffalo that I witnessed. But I didn't write anything or I did not calculate anything.

 Otherwise, you would have obtained it.
- Q. So I've looked at the photographs, the still photographs that you took, which we're fixing to look at, and I think there was some movies in there, some video.

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- A. You will have to show me.
- Q. Did you take all of those photos yourself and record those videos, or did someone else do it?
- A. On February 11 I believe I took all the photographs. It might have been that I passed the camera to somebody if I was busy. Can you take a picture of that? I do not recall that. But on the previous visit, because of what we were told, I could not personally take photographs. So I would ask counsel to take photographs because I wanted to have that basically as a document.
- Q. So all of these prior visits -- I won't hold you to the specific. We think it's about three -- including February 11, there were photographs taken either by yourself or at your direction by counsel?
- A. I don't know if it was on every visit because sometimes they'd say no photographs. I don't recall exactly what the circumstances were, but they are not always the same.
- Q. We'll get to it in a minute, but you clearly went in May of '24, and you clearly took photos or someone did because they're in your

report. Okay?

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- Yeah, on that one, on that specific one, I believe I had to ask counsel to take photographs because I was not -- the name of the game was the expert don't take photographs.
- Did they then send those images -- they, 0. DOJ lawyer, whoever it was that took the photos, did they then text or email you those digital photos for the May '24 inspection if you didn't take the photo?
 - If I didn't take the photo? Α.
- 12 Ο. Yeah.
 - At some point I got them, yes. Α.
 - And the photographs that you took on Ο. February 11 using your phone, do you still have those digital original native images?
 - I don't remember taking them with my I think I took them with a camera. phone.
 - Do you still have that camera digital Ο. photographs, original native files of the photos you took that day?
 - Well, I used the company camera, not my personal camera, and that camera is used for different projects.
 - Q. I'm not asking about the camera.

1 asking the images, the Bates native images. you still have the native images of those photos 2 3 you took on February 11?

MS. O'LEARY: Object to foundation.

THE WITNESS: My recollection they were downloaded and provided to counsel.

BY MR. DEAN:

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- So you don't have copies of these native Q. images?
 - I think I do. Α.
- But, obviously, the Department of Ο. Justice, you believe you provided the native image files to them?
- My recollection, it would have been electronic transfer of those photographs to them.

(Hennet Exhibit 12 was marked.)

17 BY MR. DEAN:

- We'll call it Exhibit 12 is all of those O. photos provided to us, whatever that date Haroon provided them.
- MS. O'LEARY: I think just referencing Exhibit 10, which has the supplemental and corrected reliance list, we're talking about the Bates-stamps HENNET_USA_1 through 96?

MR. DEAN: Correct. Like I said, I'll

- 1 just give you this.
- 2 Is this a copy? MS. O'LEARY:
- 3 MR. DEAN: Yeah. I'm going to put them
- on the screen. Actually, I was going to put it 4
- into the record, but for all of us, I'm going to 5
- throw them on the screen and refresh his 6
- recollection about all these photos.
- So for the record I've given you 8
- 9 Exhibit 12, which are the photos and we're fixing
- to show the witness. 10
- 11 BY MR. DEAN:
- 12 Ο. Now, do you see on the screen,
- 13 Dr. Hennet, a photograph dated -- with a
- 14 timestamp, date stamp of 2/11/2025 at
- 15 HENNET USA 1?
- 16 I recognize that photograph, yes. Α.
- 17 That document was produced to me as a Ο.
- 18 .pdf. I'm representing to you I don't have the
- 19 native file, but your representation to me is that
- 2.0 you personally took that photo and you took it on
- 21 February 11, 2025; right?
- 22 That's what I recall, yes. Α.
- 23 Ο. Now, whose hands are there? One person
- 24 actually has got a booboo.
- 25 Α. It's not me.

- Q. Are your hands in that picture?
 - I don't believe so. Α.
 - Q. Do you wear were cowboy boots?
 - I didn't wear cowboy boots that I Α. recall.
 - Do you know who's wearing the brown Ο. cowboy boots and the gray pants?
 - I do not know.
 - Ο. Do you know who person is kneeling down with the blue jacket, tan pants and brown boots holding something?
 - That was a person. I don't see his Α. face. But that was a person who helped doing those measurements because you cannot take those measurements alone.
 - There's a rope there and there's a Ο. person holding to the left with a bandage on their left thumb.

Do you see that?

- Α. I see a bandage on somebody's hand?
- And that's not your hand? Ο.
- That's not my hand. Α.
- Q. Now, there's a person standing back, and all I can see is two feet or two boots.

Are those boots you were wearing that

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- A. I don't think so.
- Q. So you're not in this photo?
- A. I am not in the photo, but I was there.
- Q. So we got at least one, two, three, four, five people at least were the there on February 11, 2025. Four are shown in the photo in some manner, and you're off to the side somewhere; is that correct?
- A. The people who were there as I recall were basically myself, counsel. And then there was three, four, five people who work at the water treatment plant that were basically there to assist. And I asked them questions.
- Q. What does that photo show? What is the purpose of that photo?
- A. The photograph is at the water Hadnot

 Point water treatment plant treatment next to a

 spiractor effluent to the left. That structure

 that is covered with some metals there, that's the

 head of the spiractor at that plant.

Now, what is represented on the photograph we needed to use certain tools in order to be able to estimate through measurement certain distances, and the distance we wanted to measure

was the distance between a reference point, which was that metal bar that was basically held on each side of the spiractor effluent area at the level that was basically making the bar always horizontal.

And then we had to measure a distance between that bar and the top of the effluent pipe in the spiractor. And the spiractor, at the time could do that because the spiractor was not online. So it didn't have water in it. could see the pipe and we could measure things.

So the way to do that was to use that bar and then in order to be able to get that distance, you could not go there physically because it would have been a complicated thing to do. You could not go there physically as a So we used a rope, that rope there, to person. basically position it where we wanted it to be positioned, vertically, to give a distance between the bar, the top of the bar in this case here, and what we wanted to measure, which was the top of the effluent pipe.

And then we could bring -- we did bring the rope, if you wish, and the bar back, and we measured that distance that way because we could

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not do it directly. It would have been involved getting into a system which would -- we were not prepared to do and would be extremely complicated to do.

- Q. Maybe not the safest thing to do either; right?
- A. It would not have been a safe thing to do.
- Q. So the spiractor that you were doing this measurement there from top to bottom, I believe you mentioned or said that it was empty, it was dry, there was no water in.
 - A. There was no water in it, yes.
- Q. You're at Hadnot Point water treatment plant; right?
 - A. That's correct.
- Q. Did you take a look -- did you do any research before you did this experiment? I say experiment. I didn't mean to use that word.

Before you did these measurements and went to do the work, whatever it was you did that day on February 11, did you do any work to research or look at any design drawings or research anything about the history of the equipment that you were there measuring?

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- I looked at documents. Among those documents were drawings, but the drawings were not providing me what I wanted to evaluate directly, at least the drawings I was looking at.
- Where are these drawings that you were Ο. looking at?
 - In the records, I believe. Α.
- Ο. Can you give me -- do you know what the dates of those design drawings were that you're referring to? Do you know where they were right now as you sit there today?

MS. O'LEARY: Object to form.

THE WITNESS: I do not know. They're in the record.

BY MR. DEAN:

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- Are they in your office? Ο.
- I don't know. They're in the record. So the records, I have access to the records.
- I need to identify what those records Ο. are is what I'm trying to get you to help me do, and we don't have to do it today if you don't But do you have a copy back at your remember. office of these drawings you were looking at before you went to do this work on February 11?
 - We have access of them. I believe so. Α.

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- Q. How many pages were they?
- A. I do not know.
- Q. Do you remember anything about the dates of the documents?
 - A. I do not know.
- Q. So other than looking at an unidentified yet design drawing or two, did you do any other work to ascertain the -- any historical maintenance, installation or anything like that related to the equipment you were measuring?

MS. O'LEARY: Object to foundation.

THE WITNESS: What I did is basically looked at schematics of the spiractors. And that didn't change over time to whatever I saw. It was the same type of spiractors. And there is nothing that I found in the records that say that would be a different type or that would have been changed. Spiractors are the spiractors, and they have to fit the bill in the sense that they are very large, very large volume for treatment that basically have to fit the plumbing of the a plant. BY MR. DEAN:

Q. Understood. And you remember and it's listed in your reliance materials that AH

Environmental in 2004 did some of these similar, if not same, measurements you're talking about?

- A. I don't think that's correct. AH did not do any measurement. They just looked at stuff and they estimated.
- Q. So you don't think AH Environmental measured the spiractors like you did and similar equipment back then 20 years ago?
 - A. They did not.
 - Q. Let's go to photo 2.

What is the basis or why do you think or what do you rely upon to say that AH Environmental did not do some of these same measurements on certain equipment like you did in 2004? What are you relying on?

- A. The AH report.
- Q. And you don't remember anything in my report that relates to their doing any measurements?

MS. O'LEARY: Object to foundation.

THE WITNESS: What I recall is a report that say visual estimate.

- BY MR. DEAN:
 - Q. Just a different angle, page 3?
 - A. Yes. This is just another angle. And

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if you see the opening into the spiractor, it's that little basically rectangular opening there to the left. And that's one of the complication with the Hadnot Point spiractors. They are covered with basically a metallic protection cover.

MR. DEAN: Give me about seven more minutes -- it will be at a quarter till -- and see if I can get through this or not. Then we can take a break till about -- 45 minutes or so?

MS. O'LEARY: Are you okay? Do you need a break?

MR. DEAN: It will be about seven or eight minutes.

THE WITNESS: I can do seven minutes.

BY MR. DEAN:

- Q. Next page. What is shown on page HENNET_USA Bates-stamp 4, and why are you taking that photo?
- A. This photograph is basically taken from the other side of the spiractor, which has a bigger, a larger opening. You saw on the previous photograph you have a smaller opening on one side and a larger one on this side.

On here you can see the interior of the spiractor, no water. And what you are seeing in

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the middle of the photograph is a spiractor effluent pipe.

- 0. And you say no water. How can you look at this photo and tell there's no water?
- I am telling you there is no water. Α. Ιf there was water, you would see because the water when the spiractor is online is all the way to the rim of that pipe.
 - Ο. Was there any water inside that pipe?
 - Α. Can you repeat that, please?
 - Is any water inside the effluent pipe? Q.
- Α. No.

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- The ruler there, again my eyes are Ο. getting bad as I age. I can't read the ruler there, the yellow ruler. Can you read it?
- Maybe on another photograph you can. Ιt was very difficult to measure this. I noticed that in my notes. And what we're trying to do here was without going into this dangerous place is basically to measure the distance between the horizontal bar and the rim of the spiractor effluent pipe.
 - Q. Why is that?
- Because another measurements was to measure the distance between the horizontal bar to

the top of the pipe. That would be to the left of this. The pipe basically doesn't come as much further out there.

Q. Can we go back one photo, please. Go back one more. We'll come back to that. We'll come back to that.

On photo 1, Bates-stamp 1, we can see -it's a little blurry, but you can read those
numbers. It looks like the gentleman's thumb on
the right side is somewhere around -- is it 28 or
not?

- A. I think it was 28.
- Q. Is that important that number 28, or is there some other important number?
 - A. Yes, it is.
 - Q. Why is the 28 important?
- A. Because that's the distance, the total dance between the bar, the horizontal bar and the top of the pipe where it becomes -- after it finishes curving, if you wish.
- Q. And the bar, is he holding it level or not?
 - A. Not here because now we removed it from the spiractor environment. But when it was in the spiractor environment where we deployed the roll

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there, there it was horizontal because it was held on both sides at the same level. And you can see the level on the rim of the spiractor itself because it is marked by the water.

Q. Did you measure that?

MS. O'LEARY: Object to form.

BY MR. DEAN:

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Q. So when this was inside the spiractor like you're referring to, was there a measurement there so you would know the 28 inches here is correct?

MS. O'LEARY: Object to foundation.

THE WITNESS: Yes. When it was inside, it was the rope that was used because we could bring the rope there and basically have it suspended on the metallic horizontal bar to touch the top of the pipe.

BY MR. DEAN:

- Q. Do you have the rope that's shown on page 1?
 - A. Do I have the rope?
- Q. You used that rope as a part of this experiment or measurement and that was a vital piece of your tools that day to get this measurement; right?

1 MS. O'LEARY: Object to foundation.

2 BY MR. DEAN:

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- Q. Right?
- A. The rope was provided by the base personnel.
 - Q. I understand that. My question, it was important for you to use a vital piece of tool to get the measurements. That rope was the one pieces of it?

MS. O'LEARY: Object to form.

THE WITNESS: Yes. That rope was
selected because it's not a rubber band. It is
basically something that will give you an

estimate, a measured estimate of a distance.

15 BY MR. DEAN:

- Q. Did you conduct a measurement to determine what the elastic characteristics of that rope was before you used it other than visual and yourself?
- MS. O'LEARY: Object to foundation.
- 21 THE WITNESS: It's held the hope in my
- 22 | hand and said that's fine.
- 23 BY MR. DEAN:
- Q. Did you take possession of that rope when you left doing this?

- Α. The base has possession of that rope.
- Who on the base has possession of that Ο. rope right now?
 - The water treatment plant personnel. Α.
- Have you seen that rope since Ο. February 11, 2025?
- I didn't go to the base since then. Α. the rope is there. I didn't see it since then.
- Did you ask anybody that day when you were talking to the personnel there at the water treatment plant, did you ask them to preserve that rope?
 - I did not ask them to preserve the rope. Α.
- Have you ever since 2005, which we Ο. believe was maybe some of the first time periods you started doing a little work at time Camp LeJeune, for the last 20 years, have you ever observed Hadnot Point water treatment plant operations on and water in that spiractor?
 - Α. Yes, I have.
 - When was that? 0.
- For this case, the times I went to the Α. base, every time I went there. And the spiractors that I observed at the time were actually online.
 - Q. When was that?

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I went one time in 2024 and I believe I went one time in 2023.

- Ο. Did you take any photographs of the spiractors and the operations?
- On the 2024 I didn't take pictures, but Α. some pictures were taken by counsel.
- These same spiractors were there in Q. 2024, is that what your testimony is?
 - Α. Yes.

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- Ο. And did you conduct any measurements when you were there in '24?
 - I did not. Α.
 - Ο. Was that rope there in 2024?
- 14 Not where you see on the picture. Α. I don't know if the base had that was not there. rope or not.
 - When you were there in '24, you had some Ο. DOJ attorneys with you; right?
 - Α. Yes.
- 2.0 Did you have some of the well men, some Ο. 21 of the well operations people there with you as well? 22
- 23 MS. O'LEARY: Object to foundation.
- 24 The best I recall, some THE WITNESS: 25 people from the water treatment plant were there

1 when we visited.

BY MR. DEAN:

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- And in '24, did you have a cell phone Ο. with you?
 - Α. Probably.
 - Did you have a camera with you? 0.
- I did not have a camera with me because Α. we were told pictures will not be taken by us.
- Ο. But pictures could be taken by base personnel, which they did?
 - Not base personnel. It was counsel. Α.
- Did you ask the DOJ lawyers in '24 if Ο. you could do these measurements you did in 2025 when you were there in '24?
- Could not have done those because you need some preparation to do this. complicated. On top of it, we were on a site visit with several people, other experts, counsel, several counsel. And the purpose of the site visit was not to do measurements at the spiractor. I do recall that -- and I could not have done this measurement there because I would not have had what I needed to do them. Now --
- After you were there in 2024 through 0. February 11, 2025, did you make -- during that

timeframe, May of '24, February 1, 2025, did you ever make any request for an additional visit -- excuse me. Strike that.

Between May of '24 and when you issued your report on December 9, 2024, did you make any request of the DOJ or the Marines to go back to the base to do measurements?

A. Through counsel I did. And I want to add that during the 2024 visit, unexpectedly there was a spiractor on the truck bed, that was on a truck bed. That was at the Holcomb Boulevard water treatment plant. And when I saw that, I said, well, it is there. It's not going to be there forever. And I asked counsel to take some photographs of that spiractor effluent pipe using a Metro card as a scale.

I have a Metro card. I know exactly the distance of it. And I used that as a scale on the spiractor and had counsel take photographs of that. So that's one.

Second, I did through counsel ask if the base could measure the distance that I am talking about here, that measurement that is important for parameters that is used in volatilization calculations. And I did on one spiractor effluent

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pipe at Holcomb Boulevard. And they provided me
with a measurement. It was much easier to do that
at the Holcomb Boulevard water treatment plant
because the spiractor there are not covered with
this metallic cover that you have at the Hadnot
Point water treatment plant.

Q. Two more points. Then we'll take a break.

So you did think about the need to do the measurements you did on February 11, 2025 when you saw the effluent pipe over at Holcomb Boulevard; right?

- A. The reason why --
- Q. Let me go slowly through this and, if you could, you did think about the need to do some of these measurements that you ultimately did on February 11, 2025 back in May of '24 when you saw the effluent pipe on the back of the truck, but you were at Holcomb Boulevard and you did some measurements there; right?
- A. Yes. That was an opportunity. I did that.
- Q. Didn't have the equipment, didn't what you needed or circumstances weren't right for you at the time May of '24 and you went back and did

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it February of '25?

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A. Yes. And reason I went -- that's one of the reasons I went back on February 11, 2025.

It's because of what Dr. Sabatini basically in some sense rebutted my report on some aspect of it. In his estimates, he relied on a fall height, which is a very important parameter for calculating the losses that AH report basically provided as a visual estimate.

And I was in some sense criticized because the measurement I had was not measurements for Hadnot Point water treatment plant. They were measurements for the Holcomb Boulevard water treatment plant spiractor effluent pipe. And you have two such measurements. You have the one that was on the truck bed. Basically I was there when that was done. And later on, I had requested through counsel that the base perform a measurement on the spiractor pump, and I provided that to me because I did it.

Q. When you took those photographs, and they're in your report, we're going to go over them a little bit after lunch.

On the pipe that you saw, the effluent pipe that was in truck bed over at Holcomb

Boulevard and you saw it, I guess it had been used
and it had been removed and it was in spare parts
or to be discarded area or something like that;
right?

- A. That's my understanding on the truck bed.
- Q. Did you do any work, see if had any serial numbers to ascertain how old it was? Did you do any metallurgy work on it, anything to ascertain how old that particular pipe was?
- A. I didn't see anything that would allow me to do that.
- Q. Do you even know if that pipe had actually been used in the past?
 - A. That pipe obviously had been used.
- Q. Why do you say obviously? Because it was sitting in the back of a pickup truck in a base salvage area. How do you know where it came from?

MS. O'LEARY: Object to foundation.

THE WITNESS: Two things. The pipe had been obviously used because it was encrusted, if you wish, with deposits, which is typical of all the spiractor pipes that I've seen in place. That was one. And the second point is I was told at

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1 other times that it came from the Holcomb

- 2 Boulevard.
- BY MR. DEAN: 3
- Did someone show you where it was before 4 Ο. it went in the truck bed when it was actually 5
- functioning? 6
 - Α. No.
- Did you ask anybody where that pipe came 8 Ο. 9 from specifically?
- I came from the plant. 10 Α.
- 11 Which plant? Q.
- 12 Α. The Holcomb Boulevard plant.
- 13 What do you base that on? Ο.
- That's what I was told. 14 Α.
- 15 By who? Ο.
- 16 The people from the water treatment Α. 17 plant.
- What was that person's name? 18 Ο.
- 19 I do not know that person's name. Α.
- 2.0 Ο. Did you make a record of that person's

name so if you need to go back to confirm

- anything, you'd have his or her information? 22

I did not.

- 24 That pipe could have equally come from Ο.
- 25 Hadnot Point, been on the back of a truck, and

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Α.

they parked it back there behind Holcomb
Boulevard, couldn't it?

MS. O'LEARY: Object to foundation.

THE WITNESS: I was told it was from

Holcomb Boulevard.

BY MR. DEAN:

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Q. But to be fair and reasonable with me, you don't know, you didn't see where it came in from. It could have come from Hadnot Point as well?

MS. O'LEARY: Object to form.

THE WITNESS: It was on the bed of a truck, and that's all I can tell you.

MR. DEAN: Let's take a lunch break.

MS. O'LEARY: Before we go off record, I just wanted to note that Exhibit 7, which was the email, I understand from colleagues who's looked into this, we agree that this one was not among the group where we requested the clawback, but that was an oversight. We think it was missed because of the sort of thread nature. And we assert privilege over Exhibit 7.

MR. DEAN: So let's do it this way.

Let's mark that section of the transcript

confidential. And let's note on the record when

1 | we don't agree with you, but we'll deal with it

- 2 | later. And we'll mark that document pursuant to
- 3 | your request it be considered privilege and we
- 4 | won't share it outside. We probably won't even --
- 5 let's remove Exhibit 7. Exhibit 7 will not be
- 6 attached to the transcript until this issue is
- 7 resolved.
- 8 THE VIDEOGRAPHER: We are off the record
- 9 at 1255.
- 10 (Recess from 12:55 p.m. to 1:47 p.m.)
- 11 THE VIDEOGRAPHER: We are on the record
- 12 at 1347.
- 13 BY MR. DEAN:
- 14 Q. Let's go back to Exhibit 11, your notes.
- 15 It should be in there Exhibit 11.
- 16 A. Got it.
- 17 Q. Now, as we go through this, if you want
- 18 | me -- I'm going to throw some photos -- we're
- 19 going to go back through the photos at some point
- 20 | in time. But what I'm saying is if you feel like
- it would be better for me to throw one of these
- 22 | photos up for you to illustrate what you're doing
- 23 here, just tell me.
- 24 A. I will.
- Q. We may jump around a little bit too

- 1 | because I don't have photos of water buffalos up
- 2 here yet. But let's go to item number two.
- 3 | Explain to me -- it says spiractor effluent pipe.
- 4 | That's a good photo to use? Tell me. If not,
- 5 I'll find a different one. Tell me what your
- 6 | notes say in No. 2 and how that information
- 7 | supports your opinions.
- 8 MS. O'LEARY: For the record, that's in
- 9 | Exhibit 11.
- MR. DEAN: Correct, Exhibit 11.
- 11 THE WITNESS: So item two on Exhibit 11
- 12 is basically an explanation of the result of the
- 13 estimated measurements that I performed on
- 14 February 11, 2025 at the HP WTP, HP water
- 15 treatment plant spiractor effluent pipe.
- 16 BY MR. DEAN:
- 17 Q. So which pipe -- so we're clear, you
- 18 | appear to be taking some measurements. You've
- 19 recorded some measurements here. Which pipe are
- 20 you measuring the 14-1/2 to 15, the 24 to 18? Is
- 21 | it at Hadnot Point? Is it the one that was --
- 22 which pipe are you measuring?
- A. This is specifically related to Hadnot
- 24 Point and the photographs that we have looked at.
- Q. So you're measuring that pipe in photo

- 1 | Hennet 4 dated 2/11/25?
 - A. That's correct.
 - Q. Is that a good photo for you to use to -- let me tell you what I'm trying to figure out, and I don't care how we do it, whatever is most convenient and quick for you and me both.

 I'm trying to find a photo that can demonstrate
 - MS. O'LEARY: And that's on Exhibit 11?
- 10 MR. DEAN: On Exhibit 11.

what you're doing in number two.

- MS. BAUGHMAN: Kevin, for the record
- 12 | what you're showing now is No. 8?
- MR. DEAN: IS HENNET_USA_8.
- 14 BY MR. DEAN:

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- Q. So eight is one possibility. Stop me if you see a photo that you think might help us illustrate what you're doing in No. 2.
 - A. This is a photograph that I took.
- Q. We're looking at HENNET_USA_38 taken 20 2/11/25.
- My question is: Do that help
 illustrated the measurements that you're showing
 on Exhibit 11 under item No. 2?
- A. Yes, it does.
- Q. And what does it show?

- It is basically a measurement of the diameter of the effluent pipe.
- And is that effluent pipe that you're Ο. measuring there at Hadnot Point water treatment plant?
 - Α. Yes.

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- And did you inspect -- first of all, did Q. you ask anybody when that particular pipe was installed? Did you get any history from anyone?
 - Α. Nobody knew.
 - Did you ask? O.
 - Α. Yes, I did.
- Ο. Did you look at any documents to ascertain when that effluent pipe extension or end was installed?
- I found no information as to this particular pipe installment.
- Ο. Did you look at the pipe to see if it had any markings on it, serial numbers, markings, where it came from, anything like that, to give you any information about its era?
- There is no such information that I Α. could see.
- Again, do you have a better photo? that is the best photo angle? Because of where

you were situated, I understand it was a safety issue. You didn't have the ability to shoot straight down, did you?

- A. I did not have that ability.
- Q. So you're measuring the inside diameter; is that fair?
 - A. That's correct.
- Q. And so the 14-1/2 to 15-inch measurement that you're doing there is the inside diameter best estimation just because you can't see straight down?
- A. Right. It is the best measured estimate of the diameter of the effluent pipe.
- Q. Now, see if we can get this other measurement photo. You were measuring -- is this the same pipe at a different angle?
- MS. O'LEARY: For the record, this is 82.
- MR. DEAN: I'm sorry.
- 20 BY MR. DEAN:

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- Q. I'm showing you, Dr. Hennet,
- 22 | HENNET_USA_82 showing that you took it on 2/11.
- Is that the same you pipe or a different pipe than the photo we saw before?
- 25 A. This is the same pipe.

- Q. And what is purpose of the measurement in the photograph 82, page 82?
- A. It's to obtain measurement -- measure estimate of the distance between the top of the metallic bar, the horizontal bar, to the rim of the effluent pipe.
- Q. And is that shown on your -- your interpretation or your measurement estimate, is it shown in Section 2?

MS. O'LEARY: Exhibit 11.

BY MR. DEAN:

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- O. On Exhibit 11.
- A. It is not shown on Exhibit 11, but that was measured in order to have dimensions for the pipe, per se. This is the distance from the reference bar to the rim.
- Q. And what's the inside diameter of the horizontal part of the pipe?
- A. The inside -- I couldn't measure that part, but having observed the other effluent pipe that was from the Hadnot Point treatment plant, the pipe is actually -- the diameter appears to be actually a little bit smaller away from this area that you have on the photograph and maybe further away than what even you can see on the photograph.

Q. So this is a Hadnot Point spiractor tube, right, pipe?

- A. This one is at Holcomb Boulevard water treatment plant. That photograph was not taken by me.
 - Q. Who took that a photo?
 - A. Base personnel upon my request.
- Q. We're looking at CLJA_USMC_spiractors 2, and you believe that photo was taken at Holcomb Boulevard?
 - A. Yes. It was taken at Holcomb Boulevard.
- Q. That pipe, the effluent pipe and the supply pipe at the bottom where they come together, they're the same size appear in this photo?
 - A. Yes, they do.
- Q. Where is that photo, HENNET_USA_9, taken?
- A. This one was taken at the Hadnot Point water treatment plant.
- Q. And did you measure -- so is this the same pipe that you measured the inside diameter of the top of the spiractor?
- A. That is the same pipe that we looked at before, yes.

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- Did you measure the section of the pipe, the supply pipe that comes to the curved spiractor end?
- What I measured was the distance Α. No. between the top of the horizontal bar to the top of the pipe at that location with a rope that we discussed before, and then I measured the length of that distance.
- Ο. I understand that. If I also remember for the record, I mean, all this stuff was empty, dry?
 - Everything was dry. Α.
- But what I was trying to figure out is Ο. what is your belief the diameter of this pipe is right here? It looks like to me it's PVC of some court.
 - It is not PVC.
- The two pieces are assembled in this Ο. little area here with the crease; right?
 - Α. That's my understanding, yes.
- 21 Did you measure the diameter of the 0. 22 first part of the pipe that's coming out of the 23 wall?
 - I could not do that. No.
 - Q. So you don't have any idea of the size

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of this pipe that's supplying the effluent pipe ending piece there?

- That portion of the pipe doesn't supply. Α. It is an exit. So the water enters the effluent pipe from the rim you see there, and it goes by gravity that way (indicating).
- Do you know when the spiractor is active Q. what the level of water would be in the effluent pipe horizontally?
- Α. That was estimated in the AH report as approximately 6 inches. That would be called the tail end water height.
- Can you show me -- I've got on the screen -- I'm showing you HENNET_USA_10. Can you tell me the purpose of that measurement?
- This measurement is a measurement of the distance between the top of the water reservoir to basically vent, exit.
- I cannot -- is there some reason someone Ο. didn't take the photo so you can see the measurement of the pipe clearly?
- I think there are photographs that show that.
- But that particular one you can't tell Ο. the exactness of the measurement, can you, in that

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- 1 angle?
- A. You can make a fair guess, but I think you have a better photograph of that particular
- 4 vent pipe.
- Q. I'm showing you HENNET_USA_11. Do you know what the purpose of that photo is and what's
- 7 | going on there?
- A. This is -- this was explained to me to
- 9 be the treated water after it comes out of the
- 10 | sand filters, treated water.
- 11 Q. I'm not following. Is this an
- 12 | experiment? A demonstration. First of all, let
- me ask you this: Where was photo taken
- 14 | HENNET USA 11?
- A. It is inside the Hadnot Point water
- 16 | treatment plant.
- 17 Q. Did you turn the water on?
- 18 A. No. The water is the always on.
- 19 Q. The water is always on. And that vial
- 20 | that's being filled up, was it always there?
- 21 A. I do not know.
- 22 | Q. Did you put the vial under the water
- 23 | faucet?
- A. I did not.
- Q. So do you know why that is there at all

from	any	water	supply	reasons?
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- I do not know the reason for the Α. (indecipherable) to be there. I do not know.
- Does this have anything to do with any Ο. of your opinions other than it's just an observation when you were in the treatment plant?
- I took these photographs because it was explained to me this is where the treated water, after it comes out of the treatment, that's where the samples are taken. That's why I took that picture.
- O. We're looking at HENNET_USA_7. Is that okay size-wise? Can you tell me what HENNET_USA_7 is or the purpose of the photo?
- This is an open area that was open for me of the finished water reservoir at the Hadnot Point water treatment plant.
 - Ο. And is this season normally covered up?
 - Normally that door is closed, yes. Α.
 - O. And where is the normal water level?
- The water level for the reservoir Α. fluctuates I was basically informed of by about, if I recall, 4 feet per day up and down.
- So when you measured it at whatever time 0. it was on February 11 -- I guess the water level

1 is this level right here under the first stair?

- I interpret this as the top of the water level.
- You interpreted this to be the top of the water level just below -- between the first and the second step?
- Yes. And, as a matter of fact, it was Α. explained to me to be that, because if it goes higher, the water would exit the reservoir through an overflow pipe or vent.
- Now, what stage of treatment is this? Ο. Is this ready to be furnished? Is this finished water ready to be pumped out, or is it still in the treatment process?
- This is finished water, which is basically ready to be pumped into the supply system.
- Ο. When you were there on February 11, did you drink any water?
- 2.0 Α. I don't recall. I probably -- not 21 there. I wasn't there.
 - You might have had bolted water. did you drink this water at Hadnot Point?
- 24 I didn't go down there to have a look, 25 no.

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	Q.	Does tha	at loo	k like	water	you	would	want
to	drink	with all	the r	ust in	that	tank	and a	11
the	e pipe	going dow	n? D	oes th	at loo	k lik	ke saf	е
water even today?								

- Safe water is based on measurement of Α. that water. And this is not an unusual setting for a water reservoir that has been there for a while.
 - Ο. Who told you the fluctuation was 4 feet?
- People at the base when I asked that Α. They have a system, and based on that question. system, they were able to answer that question.
- Ο. What do you mean by "they have a system"?
- They measure it, I mean, automatic measurement.
- What was the person's name that told you Ο. that it was a fluctuations of 4 foot?
- It was a person who worked at the water Α. treatment plant.
 - What was that person's name? Ο.
 - I do not recall his name. Α.
- Q. Did you make any notes other than the two pages that we have that would identify this person and the specific statement they made about

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- I did not take his name. The people were there basically serving the base. They don't give me their names. They're working. They're doing their job. And I ask them questions and they responded and I noted it.
- Do you, yourself, personally observe a Q. 4-foot fluctuation of the water level in order to be able to use that information to support or use those observations to support your opinions?

MS. O'LEARY: Object to foundation.

THE WITNESS: No. I could not have seen that within the short time that I observed this reservoir water level.

BY MR. DEAN:

- If you stayed there for 24 hours and Ο. observed this well, you would possibly have been able to make that observation; right?
 - That's possibly. Α.
- Ο. And was there more than one person who told you about the 4 feet or were there like four or five people standing around that agreed it was 4 feet? How many people were you talking about to about the fluctuation, one or more?

MS. O'LEARY: Object to form.

THE WITNESS: There were several people. And the question was posed when we were in the room where they have the water pressure monitoring They have a computer that basically shows water levels in different places. And the reservoirs are one of those places.

BY MR. DEAN:

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- Did the system of measuring the Ο. fluctuation of the water levels, did you ask them if they kept any records of that?
- I know they measure it. I would say Α. they probably keep a record of that for a period of time.
- I'm talking about you got Ο. Not you. information from the unnamed person who gave you the 4-foot fluctuation. My question was a little different.

Did you ask them whether they kept records of that fluctuation using their measuring system? Did they keep any records of this 4-foot fluctuation measuring system?

I do not know if they keep records, but that's something they monitor because it is If it is too low, there can be a important. failure. If it who high, it will overflow.

	Q.	Dic	d y	ou	ask	how	long	they	had	b€	een	using	J
this	syste	em t	0	mea	sure	e the	fluc	ctuati	ion	to	be	able	
to sa	ay it	's 4	1 f	eet	??								

- A. What I was told is that that's a parameter that has to be measured for the system to function. I can extrapolate that to say from day, one they were monitoring the water level on the reservoir, and it goes up and down because it demands (indecipherable).
- Q. You did you ask this person how long their measuring system had been a recording a 4-foot fluctuation? Did you ask this person that question?
- A. I was told that it was basically typical fluctuation.
- Q. Do you know how long that person had worked to the water treatment plant?
- A. Not exactly, but I ask. People that were there were working there for 10 years, 15 years, but not a hundred years.
- Q. The specific person that told you the 4-foot fluctuation, specifically since you don't remember that person's name, do you know how long that person had been on the base to make these observations?

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- A. As I said before, they were several person in the room, and all those people were operating this. And basically the answer was provided, and everybody chimed in. They say that's typical. That's what I do recall.
- Q. You said in the room. Did you all have a meeting either before or after you did the site work?
- A. Yes. When we talked about those specific things, like water level fluctuation, that was done inside the water treatment plant.
 - O. At a conference room of some sort?
- A. Yes, in a room inside the Hadnot Point water treatment plant.
- Q. You had a note pad that has S.S. Papadopulos & Associates with you; right?
 - A. Yes.
- Q. Did you create Exhibit 11, the two pages of notes, on February 11, or did you go home the next day or two and fill out these from some other records you had?
- A. I don't remember when I did this.

 Probably the next day this.
 - Q. Did you copy off of something else that you had?

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- A. I probably took some notes of that, like very brief notes because some of those notes you have standing. And then I just put them so they can be understood.
- Q. While you were in the room and you were taking notes on some other note pad or some other notes, did you write down the things that this person was telling you on that note pad?

MS. O'LEARY: Object to foundation.

THE WITNESS: Yes, I did. Then I transferred that here. And then basically I discarded the draft or I may still have it. I do not know that.

BY MR. DEAN:

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- Q. Do you know where those other notes are for which you created Exhibit 11 notes the next day?
- A. If they still do exist, I have them in my office probably.
- Q. Well, do you know as you sit here today if you still have them?
 - A. And I do not know right now.
- Q. But right now we do know you don't remember the names of the individual or individuals in the room that provided you this

	that	4-foot	fluctuation	history;	right?
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- The names of those people was not Α. provided to me.
- Did you ask and they just didn't want to Ο. give you that info?
- I was told that there is no photograph of individuals. And basically you had four, five people there depending on when in the tour. And I did not ask the name of those individuals one after the other.
- Did you walk in the room and extend your Ο. hand and introduce yourself?
 - Α. No.
 - Did they introduce themselves to you? Ο.
- I was basically following the leader of the visit or the leaders of the visit, which to my understanding was basically the person in charge of the entire treatment plant.
- Did you tell me you thought they kept Ο. measurement records or not?
- I said you can ask them if you want. But they do measure things, and measurements typically are kept for a period of time. I do not know the period of time.
 - Q. Fair. Did you ask them whether -- to

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look at those measurement records to verify the 4 foot that you had been told?

- A. Well, I recall that they showed me on the screen some fluctuations. I recall that. And those numbers came basically from those.
 - Q. What screen were you looking at?
- A. Again, it was in a room where they do monitor those devices that measure the elevation in many places, including the water towers, in the water reservoirs, the finished water reservoirs, the old water reservoirs, those kinds of things.
- Q. We're making progress. You're in a room with some individuals that operate the water treatment plant at Hadnot Point; right?
 - A. Some?

MS. O'LEARY: Object to form.

BY MR. DEAN:

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Q. And you are taking some notes on another piece of paper about observations, what you're learning as you're talking to these and they're showing you a computer screen with some data. Sounds like to me it's a chart, flowchart of some sort.

MS. O'LEARY: Object to form.

THE WITNESS: First of all, there was

1 individuals, not only one.

BY MR. DEAN:

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- Ο. I understand.
- Second of all, they showed me that. And I asked specific questions, like what is the water level fluctuation in the finished water reservoir. I asked that question and they answered.
 - Q. I understand.
- Α. I am not finished. And then they also showed me on the screen some graphs of water fluctuations in the water towers and the reservoirs. That's what I recall. I'm not finished.

And then I took notes of that. And for the reservoirs, my note is 4 feet typical per day. And for the water tower, it's basically 6 feet, if I recall, typical per day.

0. Thank you for that. I was asking a little different question sort of as a lawyer.

The screen you were looking at, is it a computer screen or a TV screen?

It was a computer screen smaller than the one you're showing me now, but it was hooked up to a computer I suppose because I did not check where the extension word went.

- And you were looking at some from computer data history records of some fluctuation data of some sort; right?
 - That's right. Α.
- And could you tell from looking at the 0. screen or asking questions how far back the information and data went?
- I think so because you had two axes. One was in feet and the other axis was basically time, time and date, as I recall. And what I saw was basically what was going on.
- But you don't know how far back that 0. information went?
- I do not know how far back that information could be retrieved. I do not know that.
 - Was there a printer room? Q.
 - I do not know that. Α.
- Did you take a picture of the screen O. that you were looking at to get the information for which you now opine that it's approximately a 4-foot fluctuation?
 - Α. I did not taking a picture of that.
- Did you ask anybody if they had the 0. capability to print out the screen you were

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1 looking at in order to base your opinion of a
2 4-foot fluctuation?

MS. O'LEARY: Object to form.

THE WITNESS: I did not.

BY MR. DEAN:

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Q. If you were talking to these well operators in 2025 and they've been there 10 or 15 years, assuming you're accurate, that means that they may have started their employment 2010 hypothetically using that math; right?

MS. O'LEARY: Object to form.

THE WITNESS: I do not know the exact employment history of each one of those individuals. But I asked was anyone there in the 1980s, and the answer was no.

BY MR. DEAN:

- Q. So none of them were there in the '80s.

 Do you know if any of them were there in 2004? Did you ask that question?
 - A. I did not ask that question.
- Q. And the record you were looking at, how long did you spend looking at the screen -- let me strike that and ask a different way.

All I'm trying to figure out is the fluctuation data you were looking at, the screen,

and you said it was an axis chart. Do you know what the timeframe of that chart was that you were looking at? Was it data for 2024 or 2025, the last few weeks? What era was that data and the information you were looking at on the screen?

- A. My recollection, the time axis was by the week.
 - Q. So the week before you got there?
 - A. Yes, because it was up to date.
- Q. Did you ask anybody what were any changes in the operations, the pumping operations there from 2004 to the week before you were there? Did you ask anybody if they were aware of any differences in the operational characteristics of the plant?
- A. I asked that question. Basically, to their knowledge, it was still the same. They were just keeping operating it the same way.
- Q. How long were you in the room with them approximately?
 - A. Which room?
- Q. The room where you were looking at the data on the screen.
 - A. I don't know, 20 minutes, 30 minutes.
 - Q. Was there a desk in this room, chairs?

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- A. For the people who work there, yes. I was standing.
 - O. Were there file cabinets?
 - A. I do not recall that.
- Q. Did you ask them while they were on the computer showing you that screen to go into any historic records and look at any additional documents or information?
- A. No, because I asked the question. The question I asked was in another room. Everybody was standing. But it's inside the plant. And then to answer those questions, we went to that room where you had the computer screen that basically showed me the fluctuations.
- Q. Did you ask before you went out to do your measurements -- for example, you can see the spiractor pipe HENNET_USA_4.

Did you ask any of those gentlemen in the 20-minute meeting whether or not any of these spiractor pipes had been changed since 2004?

A. I asked that question, but it was not in the same room. It was in the previous room when I asked a series of questions. Nobody was aware that any one of those pipes was ever changed to their recollection. That's what that answer was.

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So the answer was no.

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- Q. And you don't know their names. You don't know exactly how many people were in the room. You were looking at data on the screen that was for the week before you arrived. The pipes, they don't remember them being changed while they've been employees, but you don't know how long they've been employees; right?
 - A. Approximately as I answered before.
 - Q. 10 to 15 years?
- 11 A. The oldest one maybe 20. I don't know.
 12 I just tell you what I recollect.
- 13 (Hennet Exhibit 13 was marked.)
- 14 BY MR. DEAN:
 - Q. Now, Exhibit 13 I believe is the AH Consultants December 2004 report that you and I have been talking about; correct?
 - A. That's the report I mentioned, yes.
 - Q. Do you see on -- turn to page 1-1.
- 20 A. Yes.
 - Q. The last sentence at the bottom of Section 1.1, does it read, "As a part of this effort, AH conducted a literature review and a search of the appropriate archives to assist in the development of reference estimates of the VOC

removal rates that you might have occurred through Hadnot Point, Holcomb Boulevard and Tawara Terrace water treatment plants."

Did I read that correctly?

- A. You read that correctly.
- Q. On page 2-1 under the Chronology section, second full paragraph beginning, in 1982 contamination of the Hadnot Point and Tawara Terrace water systems with tetrachloroethylene or PCE and TCE was detected during monitoring of trihalomethanes.

Do you see that?

- A. I see that except you didn't read it correctly.
- Q. Do you want to read it for me? I was embarrassed because I couldn't pronounce the words. So you go ahead and read it.
- A. "In 1982, contamination at the Hadnot Point and Tawara Terrace water systems with tetrachloroethylene (perchloroethylene or PCE) and trichloroethylene (TCE) was detected during monitoring of trihalomethanes."
- Q. Now, on page -- in your report -- you might want to lay your report next to you. I believe we marked it Exhibit 3.

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- A. I found Exhibit 3.
- Q. Let's finish this first. On page 3-6 of the AH report is where I'm at now.

MS. O'LEARY: Is that Exhibit 13?

MR. DEAN: Yes, ma'am.

THE WITNESS: Yes.

BY MR. DEAN:

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Q. It says at the bottom, "The spiractors at three treatment plants were identical in capacity and dimensions. In the model, removal of VOC occurred from the top surfaces are shown in Figure 3.1 as well as from the nappe (i.e., the sheet of water falling over a weir) believed to be formed at the center effluent pipe."

Do you see that?

- 16 A. I see that.
 - Q. And then that figure is on the next page at the top.
 - A. Yes. I see that.
 - Q. What's in that photo or that figure?

MS. O'LEARY: Object to foundation.

22 THE WITNESS: This is a schematic of the

- 23 entire spiractor.
- 24 BY MR. DEAN:
- Q. And it shows in it the entire spiractor

1 | is a 22 foot tall; right?

- A. That's correct.
- Q. It's 10.4 foot wide?
- A. At the top.

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- Q. And it shows the spiractor pipe, I guess, at the top exiting to the right?
- A. Yes. That's the exit by gravity of the spiractor pipe at the top.
- Q. At the end of that first paragraph -let's read the first sentence. "Images of the
 pipes at the Hadnot Point water treatment plant
 are provided in Figure 3.2 and in Figure 3.3 and a
 detailed sketch of the effluent pipe is shown on
 Figure 3.4."

Do you see that?

- A. That's the first sentence on that page.
 Yes.
- Q. The last sentence, and I just want you to tell me what you understand this means, says, "The critical depth for a circular 12-inch pipe at a flow rate of 1 MGD is approximately 6 inches."

What does that mean?

MS. O'LEARY: Object to foundation.

THE WITNESS: Well, the MGD is million gallon per day. And that's basically the flow,

the capacity of flow through for a spiractor.
BY MR. DEAN:

Z DI MK. DEAN

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- Q. If you turn to page 3.8, next page, you see a picture, Figure 3.2 of that effluent pipe?

 Do you see that?
 - A. I see that, yes.
- Q. And it says the era according to the research done by AH Environmental in 2004, that this photo was a 1941/1942 era photo.

MS. O'LEARY: Object to foundation.

11 BY MR. DEAN:

- 0. Correct?
- A. That's what it says. I have no way to verify that the photograph was taken in 1942 or 1941.
- Q. Then there's a different looking pipe at the same Hadnot Point water treatment plant spiractor in a photo in Figure 3.3, on the next page, 3-9, says on the photo it was a 1944, 1945 era photo. Do you see that?

MS. O'LEARY: Object to foundation.

THE WITNESS: I can read that under the

23 photograph.

24 BY MR. DEAN:

Q. And do you agree with me that effluent

1 pipe is different than effluent pipe in 3.2?

- That particular pipe is I would call it The other one is called J shaped pipe, L shaped. but they serve the same purpose.
- I understand they serve, but they're Ο. different pipes?
 - They are different shape pipes.
- Ο. Now, if you go to Figure 3.4, do you see where AH Environmental has measured those dimensions of those pipes?

MS. O'LEARY: Object to foundation.

THE WITNESS: My understanding is I didn't measure those dimensions. It's a visual estimate.

BY MR. DEAN:

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- Where do you get that from? Ο.
- I don't recall exactly where, but it is in the report.
- Turn to page 3-7. In the middle of the Ο. paragraph it says the fall height. Do you see that?
 - Α. Yes.
- 23 Q. Is that the sentence you're referring 24 to?
 - And I define the fall height on Α. Yes.

- Figure 3.4 that we just looked at. And there you have the fall height sketched out.
 - No, sir. That says the fall height was Ο. estimated visually. That doesn't say that the pipe was not measured. Do you see what I'm saying?

MS. O'LEARY: Object to foundation.

THE WITNESS: What I am saying is that the fall height was not measured. The fall height is the most important parameter here.

BY MR. DEAN:

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- I'm not disagreeing with you.
- And that was not measured. I see no Α. indication they did actually measure the diameter of the pipe.
- Well, there's no evidence they didn't in Ο. this report, is there?

MS. O'LEARY: Object to foundation.

THE WITNESS: I will have to read the report again, but to my understanding, they did not measure those values. I estimated them. And the most important one is the fall height.

23 BY MR. DEAN:

> They measured the inside diameter of 0. that pipe to be 12 inches, that top measurement;

1 right?

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MS. O'LEARY: Object to form and 2

3 foundation.

> THE WITNESS: You will have to show me where in the report it says they measured it.

BY MR. DEAN: 6

- Can you show me in the report where they Q. say they did not measure it and they got these measurements visually from some picture of a pipe?
- I have not soon seen a picture of a pipe with a scale that could give you a measurement of any of those values.
- So then you would agree with me they would have had to have physically measured these pipes on the scene?

MS. O'LEARY: Object to foundation.

They did a visual estimate THE WITNESS: for the fall height. Why not a visual estimate for the other dimensions that they provide on this diagram.

BY MR. DEAN:

- They're showing that the water in the pipe and the measurement they're taking is 12 inches plus 2 to get 14; correct?
- I'm sorry. What are we MS. O'LEARY:

1 looking at?

2 MR. DEAN: I'm looking at the AH report, 3 and I'm going to stay on the AH report until I give you another exhibit number. I believe it's 4

Exhibit 13. 5

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6 MS. O'LEARY: What page?

7 MR. DEAN: I'm on page 3-10, same page 8 we've been on.

THE WITNESS: Can you repeat the question, please?

BY MR. DEAN:

Do you see that they took three Ο. different measurements or they show three different measurements there. First one is at the top, 2 inches. And then they go -- the pipe goes down 12 inches and it stops in the center, and they're depicting a water level.

Do you see that?

MS. O'LEARY: On object to foundation.

BY MR. DEAN:

Which would be at 14 inches. 0.

MS. O'LEARY: Same objection.

THE WITNESS: Again, it is a visual estimate. They did not show any measurement that would show the 2 inch. It could be 2 inch. But

the 12-inch for the fall height, which is a value that is important, I did not measure.

BY MR. DEAN:

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Q. And then there's a measurement here of 6 inches from the center down to the bottom of the pipe; right?

MS. O'LEARY: Objection. Foundation.

THE WITNESS: My understanding is I did not measure that either. I assumed that.

BY MR. DEAN:

Q. Well, that's what I'm saying. You're speculating regarding whether AH took actual measurements of whatever pipe they were looking at or what they were doing in 2004; right?

MS. O'LEARY: Object to foundation.

BY MR. DEAN:

Q. You don't know what they did.

MS. O'LEARY: Object to form.

THE WITNESS: Let's look at them one at a time. We discussed already the 12-inch I estimated. The 2 inch is also an estimate. And the 6 inch, they also estimated for a pipe of 12-inch diameter that is basically flowing by gravity at the given flow of the spiractor. To me

all of those are estimates, not measurements.

- 1 BY MR. DEAN:
- 2 Is that AH Environmental still in Ο.
- business? 3
- I don't know. I believe so, but I do 4 Α. not know specifically. 5
- 6 Did you make any attempt to reach to Q. contact maybe at AH Environmental to verify what they were referring to on the page we were just 8 9 reviewing?
- MS. O'LEARY: Object to the form. 10
- 11 THE WITNESS: I did not.
- 12 BY MR. DEAN:
- 13 Now, turn to page 4-15 in your report, Ο.
- 14 please.
- 15 MS. O'LEARY: This is Exhibit 3.
- 16 MR. DEAN: I'm sorry.
- BY MR. DEAN: 17
- Let's go back. Before we go back, let's 18 0. 19 go back to Exhibit 13. There's one thing I forgot 20 to ask you.
- 21 If you turn to page 2-5 of Exhibit 13.
- 22 I am on page 2-5. Α.
- 23 Q. Under 2.3 Water Plant Descriptions Systems, does it read, "The water systems of 24 25 concern in the ATSDR study including Hadnot Point,

Holcomb Boulevard and Tawara Terrace are described in the following sections. The descriptions are based on interviews with base personnel, site visits and an examination of the design and as-built drawings that were obtained as a part of this project."

Did I read that correctly?

- A. You did.
- Q. So AH did do site visits?

MS. O'LEARY: Object to foundation.

THE WITNESS: It says they did, yes.

BY MR. DEAN:

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- Q. And in 2004, 21 years before you were there, the personnel at the base in 2004 would have been closer in time to the early 2000s.
 - A. I don't know. It's likely.
- Q. Now we're finished with Exhibit 13.

 Would you go to page 4-15 in your
 report, which I believe is Exhibit 3.
- A. 4-15?
- 21 0. Yes, sir.
- 22 A. Yes.
- Q. In the second paragraph, you say, under
 4.5, "The first known analysis of the Camp LeJeune
 drinking water for VOCs that included COCs was in

October 1980." And you footnote 41 and refer to 1980 Jennings lab report; right?

- A. You read that correctly.
- Q. If you turn over, let's start the sentence at the bottom of page 4-15, last sentence, it begins for, about three lines up, "For example, the composite sample contained 39 percent, 18 and 11 percent of finished water from HP, TT and HB-WTPs, respectively."

Did I read that right so far?

- A. Yes, but you didn't finish sentence.
- Q. You're right. I'll come back. "The 39 percent that's above that is the Hadnot Point reference, the 18 is Tawara Terrace, and the 11 is at Hadnot Point, Holcomb Boulevard.
 - A. Yes, that's correct.
- Q. Then the sentence completes. The rest was from the five other water supply systems.
 - A. Correct.
- Q. "Analytical results" -- go to the next page 4-16 -- "reported on October 31, 1980 showed only trace levels of COCs in the composite (TCE reported at .005 milligrams a liter; 1,2-DCE at .006 micrograms a liter; VC at .01 micrograms a liter; PCE not detected; benzene not detected)."

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1 Do you see that?

MS. O'LEARY: Object to foundation.

THE WITNESS: I see that except that for TCE you said 0.05 milligrams per liter.

BY MR. DEAN:

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- O. What is it?
- A. It is microgram per liter.
- Q. Then you say, "Even assuming a worst case scenario that all the reported COCs came from Hadnot Point water treatment plant water, that would yield only trace level COCs in that system."

Do you see that?

- A. I see that.
- Q. Then "The same can be calculated for each water system, and none would show COC concentrations above trace levels. This indicates that none of the water supply systems were contaminated with COCs at that time."

Did I read that correctly?

- A. You did.
- Q. Am I understanding that opinion is based on a composite sample that was taken in 1980, that sole opinion is based on this composite sample, sole composite sample taken in 1980?

MS. O'LEARY: Object to form.

THE WITNESS: That description is based on water samples taken at eight different water treatment plants, brought to the lab, composited by the lab. Labs do know how to do that. And the composite that was analyzed.

BY MR. DEAN:

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- Q. Do you know if all those wells were operating the day that sample, composite sample was created?
- MS. O'LEARY: Object to form and foundation.
 - THE WITNESS: Explain to me what you mean all of those wells.
- 14 BY MR. DEAN:
- Q. Well, the wells that you say were sampled to make up the composite sample, were those wells operating the day the sample was taken?
- MS. O'LEARY: Object to foundation.
- 20 THE WITNESS: It was not wells that were
- 21 sampled. It was --
- 22 | BY MR. DEAN:
- Q. I'm sorry. Water at water treatment
 plants that created the composite sample, do you
 know if the plant was operating or the wells were

operating that day the composite samples were taken from the water treatment plant?

MS. O'LEARY: Object to foundation.

THE WITNESS: I'm confused because it seems you confused wells and water supply. BY MR. DEAN:

- I may have in my first part of my Q. question. I'm trying to clear it up now. My understanding is composite samples that are being referred to here, eight systems were taken, 39 percent from the Hadnot Point water treatment plant, 18 percent from the Tawara Terrace water treatment plant, and 11 percent from the Holcomb Boulevard water treatment plant; right?
- I don't think that's correct. correct is samples were taken at eight water treatment plants, basically finished water. samples were. And then they were brought to the lab or the lab took them. And in the lab they were composited in a manner that is reflected in that paragraph, 39 percent for Hadnot Point, et cetera.

23 (Hennet Exhibit 14 was marked.)

24 BY MR. DEAN:

> Q. I'll show you Exhibit 14. Just lay it

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- 1 there next to you. We'll be referring to that. For the record, this is Exhibit 14. It's CLW 430 2 through 434, which is the document you reference 3 for your sentence footnote 41. Also known as 4 CLJA_USMCGEN_6650 through 6654. 5
- 6 MS. O'LEARY: Object to foundation.
- BY MR. DEAN: 7

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- Do you see listed on the first page of Exhibit 14 the eight marked samples?
- Just checking something here. I see Α. this.
 - Let me ask you --O.
- It seems to be an issue with the Bates Α. number on these documents because you have --
- No, sir. Let me help you if I can. Your sentence, The first known analysis of Camp LeJeune drinking water's plot for VOCs that has included COCs was in October 1980. Footnote 41.
- Footnote 41 says Jenning Laboratories 10/31/1980 Camp LeJeune Justice Act CLW, CLW 430 through 435. I put in front of you Exhibit 14 is the CLW 430 through 435 document you're referring to.
- You are correct. But there is another Α. Bates number.

I agree. I agree. But you refer to --I'm just using the one you refer to and making it clear that it's the same one.

You agree with that?

- Α. I agree with that.
- The first two samples are Hadnot Point Ο. water treatment plant samples; right?

MS. O'LEARY: Object to foundation.

BY MR. DEAN:

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- Sample 1 is Hadnot Point Building 20, 0. which is the Hadnot Point treatment plant?
 - Α. Right.
- Sample 2 is -- and they took two quarts Ο. from there, which is a 152 milliliters; right?
 - No. It's 1,500. Α.
- I'm sorry. You're right. And Number Ο. two sample, they one quart from Hadnot Point Building 670?
- MS. O'LEARY: Object to foundation. 19
- 2.0 THE WITNESS: Yes. Building 670 is
- 21 Holcomb Boulevard.
- 22 BY MR. DEAN:
- 23 Q. Treatment plant?
- 24 Treatment plant. Α.
- 25 Q. Now, this is dated October 31, 1980 when

the report was issued, but it says the samples were taken on October 1.

- A. That's right.
- Q. Do you know if on October 1, 1980 Hadnot Point well 651 was running?
 - A. I do not know. Nobody knows that.
- Q. Have you done any work to ascertain from historic records whether or not well 651 was operating on October 1, 1980?
- A. I have looked. I have looked quite a lot to see what is the information on when well 651 was operated.
- Q. So go back to your report. And your report, last sentence of that first paragraph I read, says, "This indicates that none of the water supply systems were contaminated with COCs at that time."

Do you see that?

- A. That's a true statement, yes.
- Q. And you rely on this report, October 31, and everything else you say in that paragraph to reach that conclusion?
 - A. Yes.
- Q. I just want to make sure I understand that last sentence. You're saying it's your

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1 opinion based on what we just talked about that

- 2 none of the water supply systems at Hadnot Point,
- 3 | at Holcomb Boulevard or Tawara Terrace were
- 4 | contaminated on October 31, 1980?
- 5 MS. O'LEARY: Object to foundation.
- 6 BY MR. DEAN:
- 7 Q. October 1, 1980.
- 8 A. Yeah. I indicated that you had no 9 significant contamination in any of those systems 10 on October 1, 1980. That's what that reports.
- MS. O'LEARY: If we've been going for a little over an hour. So if there's point where we can take a short break.
- MR. DEAN: Now is a good time. I'm fixing to go to another subject.
- THE VIDEOGRAPHER: We are off the record at 1455.
- 18 (Recess from 2:55 p.m. to 3:06 p.m.)
- THE VIDEOGRAPHER: We are on the record
- 20 at 1506.
- 21 BY MR. DEAN:
- Q. Can you go to Exhibit 3. Actually -yeah, Exhibit 3. Let me get the right page for
 you. I want to talk about your opinions for
- 25 | Hadnot Point well 634.

Do you have independent opinions on contamination analysis of HP-634 as far as its start date of contamination, contamination at all? Do you have independent opinion on that or do you rely on Alex Spiliotopoulos?

MS. O'LEARY: Object to form and foundation. 7

THE WITNESS: I have reviewed independent data for well 634, and it is in my opinions. I describe that.

BY MR. DEAN:

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- What is your opinions with respect to Ο. contamination at HP-634?
 - It is in my report. So I can go there. Α.
- Please if you don't mind. Ο.
- 16 If you permit me to find it. Α.
- 17 I'm trying to get there myself. Ο. believe it's page 530. Page 531, bullet point --18 19 I guess it's the third bullet point down, it says, 2.0 "Supply well HP-634 was not contaminated with 21 TCE."
- 22 Do you see that?
- 23 Α. I see that, yes.
- 24 And what's the basis of that opinion? Ο.
- The data. 25 Α.

- Q. What data are you referring to?
 - The available data. Α.
- Q. It's in your report. Let's just read it together. You're saying that there's two samples taken in December of 1984 after the well was shut down and, two, after wells shut down in '86 and '91. But on those first two, December 4 and 10th they were nondetects.

MS. O'LEARY: Object to form and foundation.

THE WITNESS: For TCE they were nondetect.

13 BY MR. DEAN:

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- Do you know what the nondetected level Ο. was?
 - By memory, no, but we have to go back to Α. the data sheets.
 - O. Do you know, did you do any work or research or data analysis for the December 4, 1984 sample at HP-634 to determine whether or not that was a good sample?

MS. O'LEARY: Object to form.

THE WITNESS: I looked at what is available for the results on that date, and my recollection is that it's some information from

1 | the laboratory.

BY MR. DEAN:

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- Q. Do you know whether or not that December 4 sample was contaminated in any way?
- A. I would have to go back to the data sheets to answer that question if it is. But I recall for TCE, it was nondetect as I recall it. I would need to see the datasheet to confirm.
- Q. I think this is in your report. Table C7 report ATSDR, let's see if that's in here.

According to your -- I'll show you the form the data in just a second. I'm making a copy of it. But according to your bullet pointed note there, there's only one sample that shows a positive result for TCE, which was taken January 16, 1985 at 1300 micrograms per liter; right?

- A. Out of the five samples taken during the period, yes, that's my understanding.
- Q. But you're saying -- what's wrong with that 1300 micrograms per liter measurement taken in -- reported out January 16, 1985?
 - A. So you mean the one with 1300 reported?
 - O. Yes, sir.
 - A. Well, that particular sample was part of

a questionable sample sets that contained broken bottles based on what I have reviewed.

- Q. And do you believe that the sample that rendered the 1300 microgram per liter measurement, was that sample vial broken?
- A. Again, I will have go to look at that. There were several samples broken.
- Q. What about the sample for 634, was that vial broken?
- A. I have to back to look at that information that I cite in my report. And I want to say for these type of samples, for those type of analytical means, you always -- the protocol is to take more than one flask or one sample, so typically two or three.
- Q. But you believed that somehow because some of the vials collected January 16 that that means that the vial for 634 was somehow comprised?
- A. It is a QA/QC flag. So the data should be marked as such. You a problem with that shipment. And all the samples could have been contacted by the broken vials in the package, if you wish. And typically the flag, you say, well, you should resample.
 - Q. Have you seen any documents to date that

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1 indicate specifically which vials were broken and

- what the condition of the 634 vial was? 2 Have you
- seen any documents or data that gives you that 3
- information? 4
- I recall two or three different sources 5
- there. And I do not specifically recall the 6
- content of those. You'll have to show them to me.
- (Hennet Exhibit 15 was marked.) 8
- 9 BY MR. DEAN:
- We'll show you Exhibit 15, and this is 10 0.
- 11 the data for -- and for the record, it's
- 12 CLJA_WATERMODELING_01-33723 through 3726. And on
- 13 page -- I'm going to to this referring to the
- Bates-stamp 3724. So it's the second page. 14
- 15 Do you see the data reported out for
- 16 HP-634?
- 17 Well, this is, I believe, from the ATSDR Α.
- 18 report.
- 19 Correct. Ο.
- 2.0 Α. And this is not the documents I was
- 21 referring to. I refer to original documents that
- basically describe the sample set. 22
- 23 (Hennet Exhibit 16 was marked.)
- BY MR. DEAN: 24
- 25 Q. Now, I'm going to show you Exhibit 16.

Page 197 1 This is report # 7. 2 MS. O'LEARY: Do you have a copy of for 3 me of 16? 4 MR. DEAN: Did I hand him two copies? The last MS. O'LEARY: I'm not sure. 5 one I got was 15 which was Table C7 from the ATSDR 6 report. 8 BY MR. DEAN: 9 Ο. This is report 7 from the JTC Environmental, December 18, 1984 report, 10 11 CLJA_NAVLANT-563489 through the 563498. If you turn to page 3495, you see that that particular 12 13 Navy sample for HP-634 was received on the 12th 14 and analyzed December 14. And that's when they 15 got the chloroform, the 44V methylene chloride 130 16 reading. 17 Do you see that? 18 MS. O'LEARY: Object to form. 19 THE WITNESS: I see that. 2.0 BY MR. DEAN: 21 Do you remember that when that -- let's Ο. go to something else first. 22 23 (Hennet Exhibit 17 was marked.) 24 BY MR. DEAN: 25 Q. I show you Exhibit 17. That first one,

1 Exhibit 16, it's listed as a part of your 2 reference materials; correct?

- I believe so. Α.
- I'll show you just page 9 of your 0. reliance materials, which are Exhibit 1 --Exhibit 10 is your supplemental reliance materials. Do you see just the two reports I've handed to you, Exhibit 16 and 17, do you see where you listed both those reports in your reliance materials, the highlighted ones that I've got
- MS. O'LEARY: What do you have 12 13 highlighted?
- 14 Report 7, Exhibit 16 and the MR. DEAN: 15 report 17 which is Exhibit 17.
- 16 THE WITNESS: Stay with me.
- BY MR. DEAN: 17

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- Exhibit 16 is the report 7; right? 0.
- 19 563. Α.

there for you?

- 2.0 Do you see it says test report number 7. Ο.
- 21 That's all you got to look at on the top. 22 see it on Exhibit 16?
- 23 I see that. It says Report # 7, but the a Bates-stamp numbers for some reason --24
 - Q. Don't worry about Bates numbers. Don't

1 worry about Bates numbers. Okay? Exhibit 16 is

- test report # 7 that's referenced that in 2
- Exhibit 10 of your reliance materials on page 9; 3
- 4 correct?
- It's not the same Bates number. But it 5 Α.
- has the title report number 17. 6
- Now go to Exhibit 17 laying there. 0.
- 8 left-hand corner it says it's report number 17
- 9 Enclosure. Actually if you'll turn to the second
- page that would be the easiest. Turn to the 10
- 11 second page. And it says at the top report 17.
- 12 It says report number 17. Α.
- 13 Ο. And is report 17 in your reliance
- 14 materials on page 9?
- 15 I believe it is.
- Now, on Exhibit 17, if you turn to the 16 Ο.
- 17 page -- the easiest one for me to use is the CLW
- number 5611, so about a third of the way in. Do 18
- 19 you see the large CLW number?
- 2.0 MS. O'LEARY: That would be the Bates at
- 21 the bottom CLJA WATERMODELING 09 and then 423234.
- MR. DEAN: Mine is cut off. Sorry I 22
- 23 couldn't give you that one.
- BY MR. DEAN: 24
- 25 Q. Do you see on 5611 the sample received

January 18 reported out at 1300 microgram per liter on that page 5611?

- Α. Can you repeat that?
- Do you see at the bottom besides 87V, Ο. TCE is reported out at 1300 on the sample for January 18?
 - Yes. I see that. Α.
- Do you see anything on this lab sample 0. log, page 5611, that says anything about that sample being compromised or there being some sort of an issue with that sample?
 - Α. Not on this sheet. (Hennet Exhibit 18 was marked.)

BY MR. DEAN:

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I'll show you Exhibit 18 and ask you if you've ever seen that document before today. I will tell you it's not listed in your reliance materials as a part of the ones you specifically set out. It's probably covered in the catch-all.

My question is just: Do you as you sit there today remember reading this chronology?

- Those documents seem familiar, but there are several chronologies in the record that look about the same. So I think I have seen this.
 - Q. It's not again listed specifically in

your reliance reference materials, although it's probably in a catch-all at the end in those others, and I just was not certain of whether or not you've ever considered this document and considered it for your opinion in this case.

That's my question.

MS. O'LEARY: Object to form.

THE WITNESS: I have looked at many documents, and this is probably one of the one I looked at because I do remember documents that looked like that that were basically chronologies. I don't think they are more than one to my recollection.

BY MR. DEAN:

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Q. Now, do you see that January 16, 1985 entry? Actually let's go back up. So December 4, which was the date we were talking about earlier shown on the summary that had a nondetect remember, it says, "Sampled Hadnot Point water plant raw and treated water, plus wells 601, 603, 608, 634, 637 and 642 because of their proximity to the 602."

Do you see that?

- A. I see that.
- Q. And it also says on 10 December, a

couple lines down, "Sampled HP treated water, plus wells 601, 602, 608, 634, 637 and 642."

Do you see that?

A. I see that.

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Q. 14 December, "Received the result of the 10 December '84 sampling. Treated water levels dropped. Wells 634 and 637 previously showing nothing showed significant levels of methyl chloride. 634 and 637 were shut down."

Do you see that?

- A. Yes. It is methylene chloride. Yes.
- Q. I'm sorry. Now, I think in your report your opinion is that as of December 14, 634 has been shut down and no longer operating; is that right?
- A. 634 was shut down because of methylene chloride detection.
- Q. And it stayed shut down. It was the never turned back on as far as you know?
- A. It was not returned to service as far as I know.
 - Q. I don't know exactly what page that is.

 It might have Dr. Spilotopoulos' report.

But as far as you know as you sit here today, you don't know of any information that 634

was turned back on after that December 12?

- My recollection is that it was shut It was said shut down temporarily, but I saw no indication that it was ever put back in service.
- Let's look at that. Do you see the next Ο. entry about two down, it says 16 January 1985? you see that entry?
 - Α. Yes, I do.
- And we've already established from O. Exhibit 17, the JTC report, that 634 was, in fact, tested on January 16; right?
 - Α. Can you show me which?
- 14 Exhibit 17 or you can go to Exhibit --Ο. 15 Exhibit 17, January 16, 1985, 634 was tested.

MS. O'LEARY: What page is that?

MR. DEAN: 5611.

BY MR. DEAN:

- Page 5611, 634 was a well that was Ο. sampled on the 16th, the sample received 18th, and it was reported out on the 28th. Do you see that?
- Where is the date of sampling here on Α. this page?
 - Do you see at the top of 5611 it says 0. the Navy received the 634 on January 18?

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	Α.	Yes,	but	that'	s	not	the	sampling	data.
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- Bear with me. If you go to Ο. Hold on. exhibit -- go to Exhibit 15, which is this document, the chart. Do you see on the second page besides or down there where it says the sample date for Hadnot Point 634, it lists 12/4, 12/10 and January 16, 1300 micrograms per liter?
- Two more dates later. Yes. Α. This is from ATSDR.
 - Ο. Correct.
- This is not primary source of Α. information.
- Ο. Sir, the primary source of the information for the 1300 reading right there shows that the Navy received the sample. I'll give you it doesn't say when specifically on that page the sample was taken. It says the Navy received it on the 18th. The result for TCE on the bottom right-hand corner is 1300, isn't it?
- Α. That's correct, but it doesn't give me a sampling date.
- I understand it's not there, but we can get that date, assuming it's accurate, from Exhibit 15; right?
 - Α. Assuming that the ATSDR is accurate.

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1 There were a few typos in the ATSDR sampling 2 dates.

- Also on Exhibit -- the chronology, Exhibit 18, on the first page, CLW 4546, beside 16 January 1985, which is the same date that ATSDR listed in their report as the sample date, does it read, "Sampled all operating wells for Hadnot Point and Holcomb Boulevard water plant (HB). 37 wells"?
 - Did I read that correctly?
 - You read that correct. Α.
- Ο. So we got two. That's the original source or that a source, not the original. That's a source of the date of January 16 that all operating wells including HP-634 were sampled; right.
- It doesn't say January 16 HP-634 on what you showed me.
- It says, "All operating wells were Ο. sampled that day."
- Do you see that?
- That what it says. Α.
 - Q. 634 was sampled on that day.
- 24 MS. O'LEARY: Object to foundation.
- 25 THE WITNESS: Could be.

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BY MR. DEAN:

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- Q. The history says it was operating that day; right?
- A. That's the words that is being used in this.
- Q. So my question is: Did you disregard that fact or not consider that fact when you issued your opinion saying that the well shut down on December 12, 1984 and never went back into service?

MS. O'LEARY: Object to foundation.

THE WITNESS: I did not disregard that. I did look at the 37 wells that were sampled, and it included both operating wells and the wells that were shut down. For example, 602 was sampled. It was shut down. So I think the person who wrote this narrative just basically probably used the incorrect word because what I did is I sampled all water supply well that they could sample. That's my interpretation of that, because when I look at what was actually sampled, it included wells that were not on.

BY MR. DEAN:

Q. Do you know if there's any other evidence that well 634 was, in fact, operating on

January 6, 1985 other than the document you and I just looked at, the chronology, 4546, CLW 4546? It's Exhibit 18.

Well, I have searched for that. There Α. is no document I could find that would say well 634 after it was shut down because of methylene chloride was ever restarted. You are quoting something that is out of the -- not of the time, but somebody just did a narrative.

And when they say all operating wells were sampled, 37 wells, I looked at the data from those resampling, and it does include wells that were shut down, but they could be sampled because technically because they could be sampled.

- Did you find any other historical documents or any other information about operation of 634 when you were doing your in-depth document review in order to base your opinions other than you now believe you might have seen Exhibit 18?
- Α. Yeah. My memory come back. I have seen this. And then I just went to look at all the wells that we sampled, and those included wells that were in operation or operable as well as wells that were closed at that time.

(Hennet Exhibit 19 was marked.)

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- Let me show you Exhibit 19. The Department of Justice has retained you as an expert in this case; right?
 - Α. Yes.
- And they are defending the United Ο. States; right?
 - Pardon me? Α.
- Ο. That they are defending the United States in this litigation?
- That's the role of the Department of Α. Justice in this case, yes.
- And the location that's at issue in this Ο. case is Camp Lejeune, North Carolina, which is a Marine base under the jurisdiction of the Marine Corps which falls under the Navy.
- That's my understanding. I have not seen documents that state specifically that. I have not looked for that.
- Ο. Do you believe that the United States Marine Corps, if they were to prepare a history that applies to operation 634, that the Marines would be accurate and truthful in that chronology?

MS. O'LEARY: Object to foundation.

THE WITNESS: As I mentioned, those

chronologies are put together by somebody who was probably task to do that. That doesn't mean that it is absolutely correct. I have noticed several times where things are contradictory in the record.

BY MR. DEAN:

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Do you trust Marine Corps chemists? Q. MS. O'LEARY: Object to foundation.

THE WITNESS: What do you mean by trust?

BY MR. DEAN:

- Do you not believe or trust a Marine O. Corps chemist?
- 13 MS. O'LEARY: Object to form and 14 foundation.
 - MR. DEAN: Let me withdraw that. little argumentative. I'll object to my own question and ask a different way.

BY MR. DEAN: 18

- Do you have any reason as you sit there today right now to distrust, not believe, not feel comfortable with a United States Marine Corps chemist analyzing the operation of these wells in 1989?
- 1989? Everybody do the best they can. I don't see malfeasance, if that's what you mean,

but it is not to the exclusion of sometimes some verbiage that is not correct for litigation or basically some error. Human error happens, but -- I want to finish -- I don't see anyone who's is trying to basically say something that I didn't think was the way they said it.

But I do not cherry pick what I look at.

I look at everything. The basis of me as a
professional rendering an opinion it's not based
on the cherry picked one piece or one sentence
here ignoring the other ones. I am taking the
entirety of that, and then I make my opinion.

Q. And your opinions are based on the stuff that's been provided to you or that you've developed or researched and located, produced to you. That's where you get all your information; right?

MS. O'LEARY: Object to form.

BY MR. DEAN:

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- Q. Let me ask a different way. Did you get any information, did you get any documents directly from the Marine Corps or the Navy, or did you get all of the documents and information supplied to you by the Department of Justice?
 - A. My understanding as far as documents,

base-related documents that they basically all came through the Justice Department. But if you have a newspaper article, I may have read that, but it was not coming from the Justice department.

Q. Understood. I'm going to show you
Exhibit 19. Exhibit 19 is a memo from a
supervisory chemist Elizabeth Betz, dated 11
April 1989. Its subject says Water Monitoring
Related to the Installation Restoration Program at the top.

Do you see that?

- A. I see that.
- Q. This document is not listed in your reliance materials in any of the call-outs through page 22, although it could be covered in some of the other catch-alls.

My question: Do you, as you sit there today, specifically remember reviewing a 1989

Marine Corps water monitoring program history document?

MS. O'LEARY: Object to form.

THE WITNESS: I believe I have seen this. At least it looks like something I've seen in the past.

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BY MR. DEAN:

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- Q. And do you see on the second page, 1819, it says Installation Restoration Program

 Background Information? Do you see that?
 - A. I see that.
- Q. And if you go down to line 6, that very similar sentence where it says, "On December 4, 1984 the Hadnot Point water treatment plant's raw water and treated water was sampled as well as any drinking water wells within a mile of Hadnot Point fuel farm or Building 202. The building numbers sampled were 601, 603, 608, 634, 642."

Do you see that?

- A. I do see that.
- Q. Then the results are received on December 6. In item number 8, it says from October 31 -- excuse me. Does it say, "From 10-31 December 84 duplicate and quality control samples were run to confirm the presence of TCE, DCE and PCE in the wells. Wells 634 and 637 on a second sampling shows methyl chloride. The wells were temporarily closed until it was determined that the methyl chloride was probably a laboratory contaminant."

Do you see that?

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Q. If you turn to the next page, paragraph 9, Ms. Betz notes "On January 16, 198 37 wells serving the Hadnot Point and Holcomb Boulevard water plants were the sampled."

Do you see that?

- A. I see that.
- Q. Item number 13, moving forward, says,
 "On 1 February 1985, the 31 January 1985 samples
 showed that there was still a contaminated well
 operating in the Hadnot Point system. The results
 of the 16 January '85 sampling were phoned into
 Natural Resource and showed high levels of TCE in
 651. Well 651 is located on the backside of
 DRMO's disposal storage lot. It was not initially
 sampled as being in proximity to a NACIP site. It
 had the highest levels of TCE found. The
 concentration was in the 17,000 to 18,000 parts
 per billion range. Well 651 was shut down."

Can you read what the record what it says on February 1, 1985 about well 634?

- A. Well, we're talking back to this 1300.
- Q. Can you read into the record the rest of the paragraph I just read beginning well 634, sir.

 MS. O'LEARY: Object to form.

THE WITNESS: "Well 634 showed TCE also and was shut down."

BY MR. DEAN:

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- Q. That document says 634 continued to run some point in time after it was temporarily closed, put back in service the end of December, middle to end of December, and it ran until February 1, 1985. That's what that document says; right?
 - MS. O'LEARY: Object to foundation.
- 11 THE WITNESS: You have to help me here.
- 12 I don't see where says that 634 was operated for the water simply.
- 14 BY MR. DEAN:
 - Q. Well, it says on the 1st of
 February 1985, it was shut down. That's the
 sentence you read. And if it shut down, it means
 it was operating before it was shut down.
 - A. No. That's one interpretation of this.

 But my interpretation based on everything I have looked at is -- remember that this chronology here was done basically four years or five years after the fact. So it's basically some rehashing of things. I put more credential to basically documents that are close to when things happen or

when things happened.

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- Q. Well, this is 1989 and the other document is February 26, 1985. If you go look at Exhibit 18, tell me the date it says that that chronology was prepared.
- MS. O'LEARY: Object to form.
 - THE WITNESS: That chronology we talked about was February 26, 1985. This one -BY MR. DEAN:
- Q. 30 days later.
 - A. That one. And this one is five years later.
 - Q. Four years later and it has the same wording, for the most part, of the wording that was done when it was created 30 days within that well -- actually, the well was shut down February 1. So that's 25 days after 634 was shut down. This chronology was prepared. Isn't that sufficiently close in time, sir?
- MS. O'LEARY: Object to form and foundation.
 - THE WITNESS: No. I think you are trying to argue with me. But the information I have seen and reviewed was that well 634 was shut down in December after methylene chloride was

1 | reported in the water from the well.

BY MR. DEAN:

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- Q. And your opinion is it was never started back up?
- I'm not finished. I'm not finished. 5 Α. 6 Then I looked for information that would just support what you say, that well 634 was basically reused for the water supply. And you have 8 9 information from the time that shows you that that well was not on. And that information is given in 10 my report for the period November -- for 69 days, 11 12 November to basically February 5, 1985, that 13 period of time. And well 634 after this period of 14 shutdown on December 10 or whatever that was, was 15 not on. And that is contemporary information that 16 tells you which wells were on and which wells were 17 off. And that I rely as being primary indication and support for my opinion and deduction and 18 19 conclusion that well 634, once it was shut down, 2.0 was not restarted for the water supply.
 - Q. We'll circle back to that in a minute, move onto another subject.
- 23 (Hennet Exhibit 20 was marked.)

24 BY MR. DEAN:

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Q. I'll show you Exhibit 20. Do you see

- 1 that Exhibit 20, which is
- 2 CLJA_WATERMODELING_09-427825 through 427827 is a
- meeting, 2/27/85 meeting, the day after the 3
- chronology document is dated, Exhibit 19. 4
- Are we on 19 or 20? 5 Α.
- Ο. I think we're on Exhibit 20. I was 6 7 referring back to 19 because it's got that date at the top. The chronology is 18. 8
 - Have you seen this document before?
 - I believe I did. Α.
 - It's not listed in your reliance O. materials specifically as a call-out. It could be covered in some of the catch-alls at the back.
 - My question you to is: Do you know for certain one way or the other in forming your opinions in this case, did you, in fact, review this document or not?
- MS. O'LEARY: Object to form. 18
- 19 BY MR. DEAN:
- 2.0 Ο. If you don't remember, tell me. But if 21 you remember, I'd like to know.
- 22 MS. O'LEARY: Same objection.
- 23 THE WITNESS: This document looks
- 24 familiar to me. I believe I have seen it.

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BY MR. DEAN:

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- Q. If you turn to the second page, do you see on the page 826 it is Wilmington Regional Office. It's got a stamp February 7, 1985 in the right corner. Do you see that?
 - A. I see that.
- Q. And at the top it says Hadnot Point Water Systems. There's a location line across the top with different dates to the right. Do you see that? So the locations are up and down the left side, and the dates are across the top on the right.
 - A. That I see that, yes.
- Q. And if you go down to the bottom, in the middle, do you see the section that says "Wells out of service and could not be sampled on January 16, 1985"?

Do you see that section?

- A. I do see it.
- 20 Q. They list 610, 615, 654 and LCH 4006.
- 21 | Did I read that list correctly?
 - A. I see that.
- Q. 634 is not listed there as being out of service, is it, sir?
 - A. It is not listed there as being out of

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On a report generated or received on Ο. February 27, 1985; correct?

MS. O'LEARY: Object to form.

THE WITNESS: That's correct. And this is one piece of information I have looked at.

BY MR. DEAN:

- And you discounted and didn't -- before we go there, do you see the information for the vials in the list under 1/16? Do you see there's a 1/16 date. Then there's some results listed under it.
 - I see that. Α.
- And the location is over along the left Ο. side. Would you agree with me that this is additional information that shows that samples were taken January 16 because under January 16 next to well 634, out to the right is that same reading we looked at before, 1300.
 - Α. I see that.
 - Do you agree with that? 0.
- Yes. And if I may elaborate on this, Α. the meaning of what you read in the record that wells out of service and could not be sampled. Now, if you look at the wells that were sampled

1	and you go, for example, from the top, Building
2	20, Building 20, well 601, well 602, 603, 608,
3	634, 637, 642, 651, all of those wells were

4 sampled. All of those wells were sampled.

Those wells sampled, basically some of them were not in service. And then you have the list of the wells that were sampled.

Q. 16 is not at the top.

MS. O'LEARY: Object to the foundation.

BY MR. DEAN:

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- Q. 16 is not listed as a sample taken because it was out of service, nor was 615, nor was 654, nor was LCH 4006. Those are noted listed at the top on this document.
- A. I would like to answer, and listen to my logic. You try and pick the one you want, but listen to what is important here. Let's take, for example, well 608. Well 608 says for 1/16 it was broken. You read that; right?
 - O. Yes, sir. I can read.
- A. Does that mean it was sampled? I conclude that it does mean it was sampled. Well 608, was it an active well? No. It had been had shut down before. It was never restarted, but it could be sampled. In my evaluation of this, I

made the same conclusion for 634.

- But this says on its face that this along with the other two documents I showed you, shows that 634 was, in fact, pumping, operating, when the samples were taken on January 16, 1985 as well as all the way through at least February 1, if not February 27 when this document was prepared.
- Α. No. What this means is that 634 could be sampled like 608 could be sampled. We know that 608 was not in service. And what you made me read earlier is that wells out of service and could not be sampled outside those four.

What is meant by that is those you could not sample. Sometimes it's because you do not have a pump that function anymore or the well has been probably abandoned, so it could not be sampled.

Now, 608 was abandoned before, but it was sampled as indicated by the data. 634, I saw nothing that says that 634 was restarted after it was shut down because of methylene chloride.

I just shown you three documents. I'm not going to argue with you anymore about it.

I'm just asking you: Does that change

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your view with regard to whether your opinion is correct that 634 was shut down temporarily January 12 and was thereafter was restarted?

MS. O'LEARY: Object to form.

THE WITNESS: And I explained to you that you are reading words in a wishful manner for what you try to express. And I am explaining to you that basically I have not seen any indication that well 634 was restarted for service, but it could be sampled similarly to well 608 for example, which we know for sure was never put back in service. And by the way, the same is true for well 602.

BY MR. DEAN:

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Q. What is your basis to say that 634 was shut down December 12 and never turned back on? What is the basis for that statement?

MS. O'LEARY: Object to foundation.

THE WITNESS: The well was shut down at that time because of methylene chloride. And I found no indication that it was put back into service. And the fact that you are trying to make me admit that because it was sampled on January 16, that means it was in service.

You have plenty of more direct evidence

1 that shows that 634 was not restarted. And I

- 2 mentioned before the document that shows the wells
- 3 | that were on and the wells that were off between
- 4 | November -- sometime in November all the way to
- 5 | February 5, 1985. By November I mean November
- 6 1984.
- 7 (Hennet Exhibit 21 was marked.)
- 8 BY MR. DEAN:
- 9 Q. We're going to look at it right now.
- 10 | Now, in your report -- I'll show you Exhibit 21.
- 11 | I blew it up. You've seen that chart before. I
- 12 think that's what you're referring to; right?
- 13 A. That's correct.
- 14 Q. And you took Exhibit 21, which is an
- 15 operational monthly report of when these wells
- 16 were all -- between November 28, '84 and
- 17 | January 6, '85; right?
- 18 THE WITNESS: That's right. This is
- 19 | independent data, if you wish.
- 20 BY MR. DEAN:
- 21 Q. That you believe shows that this -- do
- 22 you think when this document was created,
- 23 Exhibit 21.
- MS. O'LEARY: I'm sorry. I have a
- 25 | foundation objection. I think you said January 6,

1 '85. I think it goes to February 5, if you look 2 at page 2.

3 MR. DEAN: I'm sorry. You're exactly

right. My apologies. 4

BY MR. DEAN: 5

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- Ο. This chart for all these wells gives November 28, 1984 and continues through 7 February 5, 1985; right?
 - Α. That's correct.
 - And you took that chart and you've Ο. created an Excel spreadsheet, and we'll talk about it later on, but you used that spreadsheet to then do some calculations and come up with percentages of operation time at these wells; right?
 - That's a basis for that, yes.
 - So this is not a report. Someone Ο. created a summary after they went and looked at some records to create this well operational history document; right?

2.0 MS. O'LEARY: Object to foundation.

21 THE WITNESS: Somebody working there did

this. 22

23 BY MR. DEAN:

> What did you do to ascertain or investigate whether the data or the information

about what months shown on this chart these different wells were operating? What work did you do to verify that this chart was accurate before you created your own chart?

A. Well, the chart -- you have information for the well we know were shut down. Let's take 634 off the table now. 602, 608, we know when that well was shut down. And we have some others. By memory I don't remember them all.

But those wells were basically but out of service, and that's documented. And they were never restarted. By memory 602 608 are the ones I remember right now. There are probably some other ones. And when you look at this chart, one of the things that I checked was, right, is this consistent with that information. And it is. So 602 for example, I know that it was shut down before November '84, and it's never on.

608, I know that it was shut down approximately in early December, and it was never on. All the ones that were contaminated, once they discovered the contamination, they shut them down.

Same for 634 now. 634 basically was never on, was never on at all after December,

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December 10.	And it	was	off	a	few day	ys be	efore	
because it w	as off.	But	it	was	never	put	back	on
all the way	to Februa	ary 1	L985	5.				

- Q. I let you finish. I let you finish. So let me ask a question.
- A. Let me finish then. So this to me is important data in that context, because it's not somebody like ASTDR, like me or anyone else who just generated this information.
- Q. My question was: You rely primarily on Exhibit 21, this chart someone created based on some other information to create your chart on page 418 in your report; right?
- A. I basically base what have in my report on this, and I made it to fit on one page.
- Q. Second question, you mentioned some data you conferred with to verify that the information in the chart is accurate.

Do you remember what you were referring to?

- A. I thought I explained that. You have information in the record that, for example --
- Q. Be specific. What information are you referring to that you conferred or reviewed to determine that you felt this chart was accurate?

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That's what my question is.

- A. For example, well 602, remember this chart are for the wells that are actually used for the water supply. They're water supply wells when you have an X that were in use to supply the water. Now, I know from the record, for example, well 602 was contaminated but was shut down.
- Q. Let me stop you there. I don't know what you're referring to. You just say the record. I need to know what documents you're relying upon that you claim you reviewed to confirm that this chart was accurate.

MS. O'LEARY: Object to form.

THE WITNESS: They are documents in the record that I reviewed that basically give you the date when 602 was --

BY MR. DEAN:

- Q. Can we agree we'll move on. As you sit there, you believe there's records. You believe you reviewed something, but you can't cite to them specifically to me right now?
- A. By memory I am describing those, but I cannot just all of a sudden present them out of my nose.

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- Q. So on Exhibit 21, the chart, beside 634 it shows it was operating on December 28 and 29 and it shows it was operating December 2, 3 and 5, and then there's nothing for it throughout --
- A. That was too fast for me. Can you repeat, please?
- Q. For 634 it shows only on the chart that 634 was operating November 28, November 29, February 2, 3, 4, 5 and 6, and it stops. If you turn and look all the way across that, it shows it wasn't operated the rest of December, wasn't operating in January. And on the back, if you go to 634, it doesn't show it operating at all in January or February.
- MS. O'LEARY: Object to foundation. I think you just misspoke and February when you meant December.

BY MR. DEAN:

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- Q. The well did not operate at all in December according this document or January or February, and that's where you got your information it must have been shut down and not come back on; right?
 - MS. O'LEARY: Object to foundation.
- THE WITNESS: That is consistent because

- 1 if it were to have been used, it will be
- 2 represented with X on this chart, and it was not.
- 3 BY MR. DEAN:
- Q. Then, sir, go back to Exhibit 20 for me.
- 5 | It's the handwritten memo page.
- A. Yes.

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- Q. I think you missed a document. If you look at page 2, that analysis, if you look at well 634 under the date 12/10, what is the 130F?
 - A. F stands for methylene chloride.
- 11 Q. Out beside both 12/4, 12/10 you have 12 this 130 reading; right?
- MS. O'LEARY: I'm sorry for which well?

 BY MR. DEAN:
- 15 O. Well location 634 th
- Q. Well location 634 there's a methyl chloride finding on a sample taken on 12/10; right?
- 18 A. Methylene chloride, yes, on 12/10.
- Q. And in order to obtain that sample, the well is operating; right?
- A. It doesn't mean it was operating. It means it was sampled.
- Q. Well, wouldn't you want to sample it when the well is operating?
 - A. Actually, you sample when you can

- sample. It doesn't have to have the well operating. By operating, I mean providing water to the water supply.
 - Q. If this chart you created on 418 that you pulled from Exhibit 21, the historical summary chart --

MS. O'LEARY: That's 418 of Exhibit 3?

MR. DEAN: Yes.

BY MR. DEAN:

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Q. You'd need to rethink your opinions, wouldn't you? If this chart is wrong, Exhibit 21, for which you created 418 and did some calculations, if his chart is wrong, then your opinions with regard to this information and calculation of these well operational contributions by percentages, those opinions would be wrong, wouldn't they?

MS. O'LEARY: Object to form.

THE WITNESS: This is a major piece of information that I considered. It's not the only one.

22 BY MR. DEAN:

Q. I understand. But what if it's wrong? What if this information you thought was accurate is wrong? Would you please agree with me you

1 | would need to go back and look at your opinions?

MS. O'LEARY: Object to form.

THE WITNESS: You're asking me to

speculate that this is wrong.

BY MR. DEAN:

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- Q. I'm saying I want you to assume it's wrong.
 - A. If you assume anything is wrong, if it is wrong, then I would consider that and see if it affects my opinion or not.
 - Q. What if some of these wells that shows they're not operating on this chart are, in fact, operating. Wouldn't that call into question this chart that you relied upon for your calculations? Yes or no.

MS. O'LEARY: Object to form.

THE WITNESS: That depends which

information you would show me. Is that

information that a well was sampled? For me, if

you show me information that the well was sampled,

it doesn't mean it was actually being pumped

22 | through the water supply at the time.

23 BY MR. DEAN:

- Q. Let's relax and go to something else.
- A. Can we take a break sometimes for

1 relaxation? I can wait a little bit more, but at

- some point, my coffee is working. 2
- 3 THE WITNESS: We've gone a little over
- an hour. 4
- MR. DEAN: I'm fine taking five or so 5
- 6 minutes if we could.
- 7 THE WITNESS: Five minutes is fine.
- MR. DEAN: Let's take a break. 8
- THE VIDEOGRAPHER: We are off the record 9
- at 1610. 10
- 11 (Recess from 4:10 p.m. to 4:19 p.m.)
- 12 THE VIDEOGRAPHER: We are on the record
- 13 at 1619.
- 14 BY MR. DEAN:
- 15 Can you pull back out your handwritten
- 16 note, please, sir, Exhibit 11.
- 17 Α. Got it.
- 18 Ο. And also out beside your report. We're
- 19 going to go to page 5-7.
- 2.0 Α. Can you repeat, please?
- 21 In your report page 5-7. We're talking Ο.
- about volatilization losses at Hadnot Point water 22
- 23 treatment plant; right? On Exhibit 2-4 you did
- some calculation work? 24
- MS. O'LEARY: I'm sorry. What's Exhibit 25

1 | 2? Excuse me. I'm just confused.

2 BY MR. DEAN:

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- Q. Page 5-7. It's also at the top called Exhibit 2-4 in your report; right?
- A. Yes. Exhibit 2-4 is actually starting on 5-6.
 - Q. How did you do those calculations?
 - A. I applied a formula that I describe in an appendix to my report.
 - Q. And you started with 1000 parts per billion, and you say that the treatment process removes like 30 percent; is that right?

MS. O'LEARY: Object to foundation.

THE WITNESS: No. I did do everything in percent. I started at 100 microgram per liter and then basically taking 100 percent and then that's what you reduced.

18 | BY MR. DEAN:

- Q. I'm sorry. You took 100 percent, started with that. You took out 30 percent for treatment process; right?
- MS. O'LEARY: Object to foundation.
- THE WITNESS: Where is that, please?
- 24 BY MR. DEAN:
- 25 Q. I'm trying to get you to explain to me

1 how you did the calculations that are shown on

- 2 Exhibit 2-4. Starting with 100 percent, how did
- 3 you do these calculations?
- 4 A. In a manner similar to what was done in
- 5 the AH report basically for the different
- 6 | elements, if you wish, of the storage treatment
- 7 and water towers.
- Q. You started with 100 percent. How much
- 9 do you believe the treatment process reduces the
- 10 volatilization losses?
- MS. O'LEARY: Object to form.
- 12 THE WITNESS: As a whole?
- 13 BY MR. DEAN:
- 14 O. Yes, sir.
- A. For which compound?
- 16 Q. Did you apply a constant percentage of
- 17 | 30 percent to volatilization losses -- let me ask
- 18 it this way.
- 19 Your overall -- on Exhibit 2-4 under
- 20 TCE, your overall evaporative removal at the very
- 21 | bottom comes out to be 17.07.
- Do you see that?
- A. I see that.
- Q. And if you add up these percentages, I
- 25 | believe, they -- do you know what they total?

MS. O'LEARY: Object to foundation.

THE WITNESS: I am not sure I understand your question. What this 17 percent is is the sum of the numbers that are in bold in the table for each chemical. This one in particular would be for TCE.

I want to add something. Those calculated results are for the system and do not include the operation of the recarbonization basin. I didn't put any value on that or it does not include other type of losses. This is evaporative losses as it is today, if you wish, or as it was when the recarbonization basin at Hadnot Point water treatment plant was not operating and the period of operation for the recarbonization basin when it was used for its purpose is unknown.

BY MR. DEAN:

- Q. Thank you for that. We'll circle back to this in a minute. Let's talk about stressor periods.
 - A. Stressor periods.
- Q. So the stressor period that ATSDR did in calculating and doing its water modeling, they use one month and look at all this well information; right?

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1 MS. O'LEARY: Object to foundation.

2 BY MR. DEAN:

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- They didn't do it daily? 0.
- The ASTDR model reported their results Α. as monthly averages.
 - Your chart we talked about earlier that 0. you created is basically two full months?
 - This one? Α.
 - Ο. Yes, sir.
- This is the information we have on which 10 Α. 11 wells were on, which wells were off for a period 12 of 69 days.
- 13 MS. O'LEARY: For the record, we're 14 referencing 21?
- 15 MR. DEAN: Yes.
- THE WITNESS: As shown in Exhibit 21. 16
- 17 BY MR. DEAN:
- Do you believe that it's representative 18 0. of the true nature of well pumping and 19 2.0 contributions of these various wells look at just 21 one month?
- 22 Object to form. MS. O'LEARY:
- 23 THE WITNESS: That's not one month.
- 24 It's more than two months.

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\square	MR.	DEAN:
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Q. Do you think that's sufficient to look at two months of data in December of '84 and January of '85 to analyze this issue about the contributions of these various wells to the pumping operations?

MS. O'LEARY: Object to form.

THE WITNESS: This is the data that is available. And I will comment on this in the sense that during this period of time, you had less wells available for pumping because some of them had been closed because of contamination, which implies that the other wells had to compensate for that. So that information probably exaggerates -- not exaggerates -- but gives a relative on and off period for the well that is -- you had less wells. So you had do operate the wells a little bit more to compensate for that.

BY MR. DEAN:

Q. Do you remember -- well, you made the mention about wells coming off line. You know that new wells were put in as well in this same timeframe; right? Have you seen that data?

MS. O'LEARY: Object to foundation.

THE WITNESS: I don't recollect the date

of new wells you would be talking about. But
there were new wells, especially -- probably -- I
do not know the date of the new wells by memory,
but there were some, and I believe they were
either for Hadnot -- Holcomb Boulevard system came
later as far as Hadnot Point system was concerned.
BY MR. DEAN:

Q. If new wells were coming online hypothetically at a particular water treatment plant area, that sort of changes the history or what's going on with pumping because you're taking some off line and then you're bringing on some new ones. And if all this is occurring at the same time, it could artificially not represent the true history of what might have been taking place previously with respect is to certain wells.

Do you see what I'm saying?

MS. O'LEARY: Object to form.

THE WITNESS: I understand what you are saying and I understand you are talking about the tools in that sense, and nobody knows for the past except this period of time, which is data in my opinion.

BY MR. DEAN:

Q. And you think it's okay just to look at

1 | these two months even though at the same time of

- 2 | these two months, some wells are coming off and
- 3 others are potentially coming on?
- 4 MS. O'LEARY: Object to foundation.
- 5 THE WITNESS: This is the data that is
- 6 available.
- 7 (Hennet Exhibit 22 was marked.)
- 8 BY MR. DEAN:
- 9 Q. I'll show you Exhibit 22. Do you see
- 10 | that HP-622 -- let me just for the record,
- 11 | Exhibit 22 is CLJA_WATERMODELING_05-826091 through
- 12 826118.
- Do you see that HP-622, Hadnot Point,
- 14 | new well 622 put in 5/19/82 the construction was
- 15 | completed. And on 6/1 there's a note that it went
- 16 | in service. Do you see that?
- 17 MS. O'LEARY: Object to foundation.
- 18 BY MR. DEAN:
- 19 Q. Do you see that?
- A. I don't see the last part, but you have
- 21 to be patient with me.
- 22 Q. At the top, 5/19/83, construction
- 23 completed. 6/1/84 it's in service.
- A. I see that on this document, which is
- 25 | from the ATSDR, I believe.

Q. Right. But I mean they're citing let
me ask you this: Do you not trust any of the
historical information that was completed by
ATSDR? And they've even footnoted where they got
the information from, including Scott Williams, a
June 6, 2008 email about well runs from Scott
Williams.

Do you not just the information that's on this chart?

MS. O'LEARY: Object to form.

THE WITNESS: It is trust, but verified. I do not care who did what. I just go always to the original document that's close to that that and I can do, and I consider everything in between.

BY MR. DEAN:

Q. And the capacity for which this well was originally drilled and -- I don't know if certified is the right word, but capacity in gallons per minute was 323 at the top.

Do you see that?

- A. That's capacity of the well at construction, yes.
- Q. And well capacity test was performed again 9/5/85 it's at 320. 1986 it's 320. 1988,

- 290. 1988, 330. Do you see that? So it's consistently in the 320, 330 range; right?
 - For this well, it is.
- Now, if you turn to well 623, its Ο. construction was, I quess, about the same day, a few days off. May 25 it says it was completed. Its capacity was originally 360. It went in service August of 1984 according to operation records. 1985 it's got a well capacity test of 242.

Do you see that?

- 1985 I see that 242 capacity. Α.
- Ο. Turn to the next page Bates-stamp ending The next one HP-628 (new). Do you see that new well went in 6/1/1984 construction completed. I guess there's some capacity reading of 160 in October 1984.

Do you see that?

- I see that. Α.
- Turn to the next well, well HP-660, that Ο. one, construction was completed in July of '83. Capacity test or whatever result in service 7/1/84, and it had I guess a capacity test previously at 151 in November of '83.

Do you see that?

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- 1 Α. I see that. That's the only capacity 2 test.
 - Q. Agree with you.
 - And it was put out of service and later Α. abandoned.
 - Correct, 1994. HP-661, drilled in March 0. of '83. In service August of '84. Well capacity test October 26, '84 was 280.

Do you see that?

- Α. I see that.
- And the last one is 662, last page O. ending 118. Says it was in service August of '83. Well capacity test October of '83 146. In service November 1984. Another well capacity test August of '85 at 168.

Do you see that?

- I see that. Α.
- Ο. So going back to my question, with all of those wells contributing, if you add them all up, over 988 gallons per minute in addition to the raw water supply, do you really think looking at the two months that you looked at still are representative of well cycling?

MS. O'LEARY: Object to foundation.

THE WITNESS: What we talked about on

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this sheet, it tells you which wells were on, which wells were off. A well can be in service and but not being bumped.

BY MR. DEAN:

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Are you aware that November 30, 1984 the Ο. Navy received test results for 22 sampled wells, that well 602 was contaminated with benzene and that that initiated additional plans for further testing?

Do you remember that fact?

- What was the date you mentioned? Α.
- 0. December 30, 1984.

MS. O'LEARY: Object to foundation.

THE WITNESS: I don't recall the exact date, but during that time, well 602 was shown to be contaminated and was basically shut down.

BY MR. DEAN:

- And that finding initially would have 0. resulted in some additional testing and the well shut down?
- 21 MS. O'LEARY: Object to foundation.

The evaluation by 22 THE WITNESS: Yes. 23 the base went step-wise. They were trying to understand the problem. 24

BY MR. DEAN:

Q. For 602, and I believe it's in the records, there were well tests of 602 December of '84 and January '85 to locate the sources of contamination; right.

MS. O'LEARY: Object to foundation.

THE WITNESS: What do you mean by well

8 | test?

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BY MR. DEAN:

- Q. If you take a look at Exhibit 15, it's the chart with all the well tests summarized.
- 12 | It's Exhibit 15, ATSDR table. You can use mine.
 - A. I'd love to find mine so you can keep yours. Got it.
 - Q. Do you see beside HP-602 all of the testing that was done in November and December checking for contamination?
 - A. I see that. We're talking about chemical tests, I mean sampling and laboratory analysis of chemicals. Just before we were talking about capacities.
 - Q. Would those tests have affected pumping?
 MS. O'LEARY: Object to the foundation.

24 BY MR. DEAN:

Q. Operations.

1	MS. O'LEARY: Object to form.
2	THE WITNESS: Test affected pumping?
3	The sampling of a well may be done when the well
4	is actually supplying water or when a well is not
5	supplying water if you have a pump that works that
6	is (indecipherable).
7	BY MR. DEAN:
8	Q. And that well was shut down, 602 was
9	shut down after those contamination results were
10	received in December of '84; correct?
11	MS. O'LEARY: Object to foundation.
12	THE WITNESS: My understanding, it was
13	shut down because contamination was reported.
14	BY MR. DEAN:
15	Q. Would the fact 602 being shut down not
16	impact pumping schedules for the other wells?
17	MS. O'LEARY: Object to form.
18	THE WITNESS: That depends if the well
19	was in use or not. But, of course, you had one
20	less well for the supply when they shut down that
21	well.
22	BY MR. DEAN:
23	Q. When you shut down one well and you got
24	so many people on base, doesn't it potentially
25	impact pumping operations at other wells?

	Α.	Υe	es,	it	do	es.	You	either	h ha	ave	to pu	qm.
the	one	you	hav	<i>т</i> е	for	а	longer	time	or	you	have	to
add	well	ls.										

Q. What information would you need, going back to Exhibit -- going back to the well service for the couple months that we've been talking about record that you used to create your chart, what records would you need to look at if you wanted to enhance this analysis to look and see about what was going on with well operations either before or after these time periods?

What sort of records would you need?

MS. O'LEARY: Object to form. This is

Exhibit 21.

THE WITNESS: It doesn't exist to my knowledge, because I have looked for. And for the time prior to this, you basically have -- if any record, you basically have nothing all the way to 1942. You know the number of wells, more or less, that you had that were potentially in service. But you do not know if were they pumping or which group of wells were pumping.

(Hennet Exhibit 23 was marked.)

BY MR. DEAN:

Q. I'll show you what I'm going to mark as

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1 | Exhibit 23. This is some historical information

- 2 | about well capacity, operational history for
- 3 | HP-651. Do you see that? It's Bates-stamped
- 4 CLJA_WATERMODELING_05-826112.
- A. I see this is again from the ATSDR
- 6 report.
- 7 Q. Yes, sir. You see like some of the
- 8 other ones we've looked at, this information down
- 9 at the bottom under the footnotes, you see there's
- 10 footnote number three. For example, under that it
- 11 lists all the data sources for which this
- 12 information came including operation records.
- Do you see that?
- 14 A. Number three?
- 15 O. Footnote three.
- 16 A. AH Environmental Consultants, Inc.,
- 17 electronic communication, September 3, 2004.
- 18 | Q. Now, you see that well was constructed
- 19 | in 1971. Do you see that?
- 20 A. I see that.
- 21 Q. It says it went in service in '72. And
- 22 | I think you got that in your report. Do you
- 23 remember that?
- 24 A. Yes, I do.
- 25 Q. And it was originally marked with a

1 capacity or constructed with a capacity rating of 2 200 gallons per minute; right?

- It was tested at the capacity of 200 gallons per minute with a set pump at a given elevation. We were given horsepower.
- Ο. 1977 well capacity test. It says 190. 1979, well test capacity test is the 167. 1980, capacity 178. 1981 it goes up to 232. 1983 it goes up to 239. And October 29, 1984, it's pumping at its highest rate, 242, according to this information; correct?
- Α. According to this, it is correct. And I have looked at the information for this well as well.
- And in your report, you opined that Ο. HP-651 is only operating 39 percent of the time based on your calculations and using the spreadsheet you created from the historical record of operation of these various wells, Exhibit 21; right?
- 21 Object to foundation. MS. O'LEARY:
- 22 THE WITNESS: That's the data I have and
- 23 that's the data I used.
- BY MR. DEAN: 24
- If it's pumping all of those historical 25 Q.

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timeframes where it was tested, does it really make sense that it's only pumping at 39 percent?

MS. O'LEARY: Object to foundation.

BY MR. DEAN:

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- Q. According to your calculations?
- A. 39 percent of the time?
- Q. That's right.
- A. This is what the data supports.

 (Hennet Exhibit 24 was marked.)

BY MR. DEAN:

- Q. Now, again so you and I can see it better, I took your page 4-18, which is your Excel spreadsheet graph, and this is Exhibit 24. It's that same page out of your report. It says in your report under that chart Exhibit I-9, Frequency of Use of Supply Wells, November 28, '84 to February '85. And your conclusion, Supply well HP-651 was on for 27 out of 69 days, and that gave you an average pumping frequency of .39; right?
 - A. That's correct.
- Q. And that is the basis for your opinion that this HP-651 was only pumping 40 percent of the time or thereabouts?

MS. O'LEARY: Object to foundation.

THE WITNESS: That's it, yes.

1 (Hennet Exhibit 25 was marked.) 2 BY MR. DEAN:

Now, I'll show you Exhibit 25. And that 0. document is an email from Anita Short at the top. It was a document found in the CAGE, identified as CLJA_USMC_CAGE_350325 through 345. You see the subject line of all these emails is the same. It says HP & HB Well Pumps: January to June 1980.

Do you see that?

- Α. I see that.
- Now, I didn't see this document listed Ο. on your reference materials specifically called out, although I think it might potentially -while I'm doing that, just confirm if it's in the catch-all.

Do you remember ever seeing that document before?

- I may if it is -- I may have seen it, Α. but it seems to be indicating some water levels.
- Ο. In order to get these water levels, would you agree with me the well has to be pumping?
- No. Some of them when you have a 3-foot water level, it's probably not pumping, 3-foot draw down as it's called.

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- Q. If you go to well 651, which will be on page 29, it's about the third page in, you see well 651, the January 1980, that first record, you say it says stat 25 foot, pump a hundred, draw down 75. Do you see that?
 - A. I see that.
 - Q. If you look across that, you see in February, March, April, May it shows all those lines filled out and it's pumping?
 - A. It's pumping sometime during that period of time; right.

(Hennet Exhibit 26 was marked.)

13 BY MR. DEAN:

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- Q. I'll show you Exhibit 26. This is CLJA_USMC_CAGE_67935 through 68188. This document is not listed in your reliance materials specifically. But do you see that it starts in 1978 at the beginning on that second page at the top?
 - A. I see that.
- Q. If you turn about four pages in till you get to the well 651, do you see some operational data in the information there?

MS. O'LEARY: What's Bates-stamp?

MR. DEAN: CLJA_USMC_CAGE_67935 through

1 8188.

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BY MR. DEAN:

- Q. Right now I'm asking the question about age 7944. Do you see well data, monthly well pumping data for Hadnot Point, well 651, for July on that particular page, August, September?
- A. This does not give you pumping values. It just tells you that during those months, the well that we are talking about were used. That doesn't mean they were used all the time. Of course, they were not.
- Q. I understand, but that's some information that on that particular month that well 651 was operated at sometime. We don't know the exact date?
- A. Exactly. But what this tells you as well is for 651 is that it was not operated in October of that year at all.
- Q. Let's go back to -- where do you see that? Show me what page you're looking at.
 - A. We were looking at page 7944.
- Q. I agree 100 percent. October it's not working at all?
 - A. At least it's not reported.
 - Q. Did you consider this information at all

in forming your opinions about what months -- scratch that.

If you look through this entire exhibit, do you see that it goes all the way through July of 1983, December?

6 MS. O'LEARY: Objection. Foundation.

7 BY MR. DEAN:

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Q. Do you see on the last page, page 68188, is July of '83 to December of '83?

MS. O'LEARY: Object to foundation.

THE WITNESS: That page does not inform me on 651. But that page goes to December 1983 but for some wells at different places. So that's

fine. I see you probably have it under Hadnot

15 Point.

16 BY MR. DEAN:

- Q. Here it is. It's going to be on page 68148, well 651. The previous page, 68146, began January of '83. Do you see that?
 - A. I am on 68146.
 - Q. Do you see 1983 Hadnot Point at the top?
 - A. I see that.
- Q. And the next page, which for whatever reason, there's a Bates -- my next page says 68148.

MS. O'LEARY: That's what I have as

- 2 | well. I don't have a 7.
- MR. DEAN: I don't know what's going on
- 4 there at all.
- 5 BY MR. DEAN:

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- Q. But you see 651?
- 7 A. I see that, yes.
 - Q. January through June?
 - A. Right.
 - Q. July through December is on about three page over beginning page 54.
 - A. Yes. It goes all the way to December.

 And I believe if you follow the logic of this, it
 would be '83.
 - Q. So we have some information for all of those months, 1978 through January of '84 where well 651 is pumping. I'm not sure how many days. But it's pumping at least one day. And you didn't consider that evidence in forming your opinions that the well is only operating 39 percent of the time?
 - A. I have never said that well 651 was not a water supply well during the period 1972 until it was shut down in 1985. It was available.
 - Those sheets are consistent with that, but I did

not	give	you	а	frequency	οf	use.
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Do you agree that if you took into consideration those operational months, it would expand potentially the time periods to consider for reaching your calculation of 39 percent using only two months versus five years of well operational history?

MS. O'LEARY: Object to form and foundation.

THE WITNESS: I will re-answer. This information shows that the well was available for that period that is documented in this Exhibit 26. But that doesn't give you a frequency of use. BY MR. DEAN:

Now, let's go to something else, talk Ο. about water buffaloes. When you read Dr. Sabatini's report, you realized that Dr. Brigham had made a mistake about how the water buffaloes were filled back in the day as far as what hatch or location they were filled; right?

I don't see what mistakes. THE WITNESS: My recollection is Dr. Brigham just showed water buffaloes, several types of water buffaloes that were used at the base at the time.

MS. O'LEARY: Object to foundation.

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BY MR. DEAN:

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Q. Well, Dr. Brigham assumed that all you water buffaloes were M107s or if they all -- if they had other models, that they were being filled through the filler neck; right?

MS. O'LEARY: Object to foundation.

BY MR. DEAN:

Q. That what he says in his historical expert opinion report, that these water buffaloes were filled through the filler neck.

MS. O'LEARY: Object to form and foundation.

THE WITNESS: You have to show me where he says that because I don't recall that.

BY MR. DEAN:

Q. Well, you relied upon that up until the time you issued your report to support certain opinions about volatilization. And after Dr. Sabatini provided his report, you then went back out there February 11 and did your work including filling a water buffalo; right?

MS. O'LEARY: Object to foundation.

THE WITNESS: When I made my calculation for the fill up of a water buffalo, I had a diagram of a water buffalo and I filled it up

through the filler pipe for my calculation. 1 then I made that calculation. And then I just saw 2 3 the expert report that rebutted my report by Dr. Sabatini in which he basically agrees with me 4 on the methodologies. But there he just also 5 included two affidavits that I had seen before 6 that says that the water buffaloes, at least some of them, were filled up through the manhole. 8 9 understand that, and that one of the reasons I went back to the base to basically evaluate that. 10 11 BY MR. DEAN:

Q. When you issued your report in December 2024, December 9, 2024 when you issued your original report, did you do anything at that time to verify any of the data in Dr. Brigham's report?

MS. O'LEARY: Object to foundation.

THE WITNESS: I wrote my report.

BY MR. DEAN:

Q. Can you answer my question yes or no.

Did you do anything to verify his data when you first saw his report before you prepared yours?

MS. O'LEARY: Object to form and foundation.

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THE WITNESS: I did not do anything to verify Dr. Brigham report, which basically came at the same time as mine. And I made my calculation as I explained in my report.

BY MR. DEAN:

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In your report, you did your 0. calculations based on Dr. Brigham's report saying that they were filled through the filler neck; right?

MS. O'LEARY: Object to foundation.

THE WITNESS: You will have to show me where and what Dr. Brigham says about that if he said it as you tried to insinuate, that they were only filled up through the filler. I don't recall reading that. So you have to show me that, and I will be able to answer.

BY MR. DEAN:

O. You assumed when you wrote your report on volatilization issues about the water buffaloes you relied on Dr. Brigham's report. And I can represent to you he says in the report they were filled through the filler neck, and that's what you have in your report.

MS. O'LEARY: Object to foundation.

THE WITNESS: You have to show me

Dr. Brigham's report where he says that because I don't recollect that specifically, not that it really matter for my opinion.

BY MR. DEAN:

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- Q. So you go back and you do this work. How does that either change your opinions about how these water buffaloes were -- the volatilization of the water buffaloes?
- A. You are going to have volatilization losses when a water buffalo is being filled up.
 - Q. Let me ask you this.
 - A. I am not finished.
 - Q. Let me withdraw the question.
 - A. I am not finished.
- Q. I'm withdrawing the question. It's my question. I'm trying to get us out of here on a timely basis. Okay?

Did you do any work before you issued your first report to that determine how long it takes to fill a water buffalo either through the filler neck or the manhole cover?

A. I didn't make a specific calculation because I didn't have time of fill up. But my understanding was that it goes relatively fast because we are dealing with big filling pipes or

hoses, if you wish.	They are not a	garden hose.
Those hoses are full	pressure hoses	that can
deliver 100, 200 gal	lon per minute.	

- You went back on February 11 and you 0. evidently filled up a water buffalo with a hose because I've seen in it photos; right?
- Α. I did not fill it up myself. Ι witnessed the fill-up of a water buffalo by the base personnel.
- Did you time -- not time -- did you Ο. videotape the filling of the water tank?
- Α. I did not videotape it. I took many pictures as it was being filled up. And I did time the time it took to fill up that water buffalo at that stage.
- What did you use to record that time? Ο. watch? A stopwatch?
- I asked specifically counsel stopwatch. And I said start and at the end I say end. And I was on the top of the water buffalo taking pictures.
- Did you record somehow that stopwatch by the Department of Justice employee or lawyer to see if they actually started and stopped the watch when you told them to? Did you do anything to

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record this timing of the filling?

- It was reported to me as 3 minutes and 23 seconds, which is consistent with whatever Dr. Sabatini says about filling up through a manhole.
- When you did this experiment or document Ο. the timing, did they fill it through the filler neck or the manhole cover?
 - Α. It was filled through the manhole.
- And did you all tell him how to fill the Ο. water buffalo?
 - I did not. Α.
- Did he stay on top of the water buffalo holding on the hose for the 3 minutes and 23 seconds to fill the water buffalo?

MS. O'LEARY: Object to form.

THE WITNESS: Who is "he"?

BY MR. DEAN:

- Whoever filled the water buffalo as Ο. shown in the photos.
- Yes. There two personnel from the base, Α. two Navy Marines. And one of them was basically holding the hose and filling up. The other one was basically handling the shutoff valve and shut-on valve. I was on the other side of the

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water buffalo observing and taking pictures.

- Did you have an iPhone that you were taking picture on?
- I think I took them with my company Α. camera.
- Did you have the capacity, you or the Ο. DOJ lawyer with you, to record the video if you had wanted to?
- Α. Well, I took a lot of pictures of that filling up.
- Q. Could you have videotaped it if you wanted to?
- I was not permitted to videotape. I wanted to take photographs and I did. And for me as an expert for that, this is sufficient information to support my conclusions.
 - My question is not that. Ο. Did your phone have the capability or
- 2.0 Α. My private phone has that capability.

the DOJ's lawyer to videotape?

- So when you had the Marine stick the Ο. hose, did he hold it up at a certain level, or did he drop it all the way into the tank? How did he handle the hose?
 - My recollection, and that can be seen on Α.

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the pictures. Basically the hose is partially inside, but it's still under water. It is above the water level in the tank.

- Well, did he start with the hose all the Ο. way at the bottom and then pull it up as it comes out, or did he leave it in there and let the water buffalo fill up and then when it got to the top, pulled it out then? How did he handle the hose?
- He was holding the hose, to the best of my recollection, and that's documented in the The end of the hose, if you wish, was picture. basically always above the water level in the tank.

I want to say one more thing. possible that some of the picture I took with my cell phone because at the time, there was some -because it was cold and raining, if I recall, you get some fog on the camera I had. So I don't know if it was -- that's kind of what I recall. wanted to put that in the record.

Let's move to different subject. review report issued in 2009, did you play any role in any aspect of the start of that report, assisting with getting -- identifying who might be a good person to be the panel?

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Did you have any discussions with anyone, whether it be someone with the Marines or the NRC, a lady named Susan Martel whose deposition you read. Did you talk to anybody about the formation of that committee back in 2006, '7, '8?

- A. I do not recall such discussion, and I don't know that person Martel you mentioned is. You suggested that I read that deposition. I do not know. You will have to show it to me.
- Q. You don't remember reading Susan Martel's as you sit there today?
- A. As I sit here today, I have read a lot of depositions and I do not associate names, this name, to anything that I have seen unless you were to show me the documents you are talking about.
- Q. How many water modeling hydrogeology experts do you remember that served on that NRC committee panel?
- A. I have no recollection or understanding of that.
- Q. Let's talk about travel time of contaminants at TT-26. In your report 5-15 -- I believe your report is Exhibit 3 -- 5-15 you say it's 15 to 25 years travel time for PCE from the

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1 dry cleaners to TT-26; right?

MS. O'LEARY: Object to foundation.

THE WITNESS: Can you repeat, please?

BY MR. DEAN:

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Yeah. Let me ask you a question I Ο. forgot to ask you at the end of the last one about the water buffalo.

I didn't see anything. You haven't done any new calculation based on the observations you made when you were filling the water buffalo on 2/11?

Α. I have not done calculations, but I have basically looked at some EPA information that gives information on, for example, when I saw the water buffalo being filled up with aeration, I say, well, the best comparison to that would be faster fill-up, but it would be much less aeration, if you wish, because I have seen bathtubs being filled up.

And I considered that, and I say, well, with the large amount of aeration that I observed when the water buffalo was filled up in 3 minutes and 23 seconds or so for 400 gallons, you have a lot of aeration. And I estimated that, yeah, substantial loss that is comparable to what I

calculated for the strainer. That's basically --1 I didn't do calculations, but I did for myself an 2 evaluation of that. 3

BY MR. DEAN:

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- So travel time for contaminants at Ο. TT-26, on page 5-14, you state, "The release of waste materials containing PCE at ABC Cleaners was gradual." Okay? Do you see that?
- Α. I don't see that, but I believe I say that. Can you tell me where it is?
- Second sentence in the last paragraph at Ο. the bottom. "ABC Cleaners started operations in mid 1954. The release of waste materials containing PCE at ABC Dry Clearance was gradual." Footnote 86. And you're citing to a North Carolina Department of Resources Community Development report by Rick Shiver.

Do you see that?

- I see that. Α.
- And then page 5-15, you opine in the Ο. bottom paragraph that the PCE travel time between ABC Dry Cleaners and TT-26 are in the 15 to 25-year range. And you've got a chart on page 5-16 where you -- the next page, Dr. Hennet -where you illustrate in Exhibit 3-1 those travel

times.

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Do you see that?

- That's an illustration. Α. Yes. And details of this is provided as an attachment to my report.
- Ο. How did you choose those three travel pathways at 25, 20 and 15?
- Well, I calculated the time it would take for the contaminant PCE dissolved in groundwater to travel to the well from ABC Cleaner, and I used as a basis a simplified setup which is the same as the ATSDR model used, the same layers, the same thickness of each layer, the same permeability in each layer and such.

And what I did as a hydrogeologist and a geochemist, I applied the fundamental equations of formulas of evaluating fate and transport when you don't have data to illustrate that basically you can get answers that are different from what ATSDR has done as far as the travel time that are as valid and even more in this case, because ATSDR made mistakes and errors in what they did at Tawara Terrace on the parameters.

I used parameters that were the same as in the Hadnot Point model, and I used to calculate

the retardation for those travel time. I relied on the site-specific data that the ATSDR did not consider even though it did exist.

So nobody knows what happened in the domain where you have no data with any degree of reasonable scientific certainty. You have many ways that you can calculate travel times to arrive to a well.

The thing I want to say, in this case, you are trying to calculate travel times for a period of 30 years during which you have zero data for the contamination arriving at the well. you have two or three years -- well, you have some data, and that data is a huge portal, if you wish, because it has a huge range. It goes from zero to hundreds.

So ultimately you have many ways to get through that portal. This is one way. This way here, is there's no fundamental error like in like ATSDR has. It's a Tawara Terrace model. And it. is actually something that is -- that I would rely on to give you what is a range, a reasonable range, and that's what I did.

How, if at all, did your methodology take into account the cone of depression that

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develops around a pumping well which causes the losses to increase in the direction of the well?

In this calculation here that is basically summarized on this figure, I considered ATSDR water level that they use in their model for both layer one and layer three. And I derived congruent gradient from that.

Now, it is true that the closer to you get to the well, you have what is called a cone of depression, and that cone of depression for potentiometric values would be in layer three because that's where the well is pumping, and it will be less marked in layer one.

So you have several things that you can say that would slightly accelerate or diminish those travel time, if you wish, but you have other things that would actually make them longer. thing that would accelerate potentially would be as us you get very close to the well, you accelerate. But before you get it close to the well, you have a long way to go. That's the first thing.

The second thing would be you could have dispersion that is not in this calculation. Nobody knows what the dispersion is, but that

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would accelerate this as well somewhat. On the other end, on the other end, things that would actually elongate the time of travel are two major things. The first one --

- O. Let me withdraw --
- A. I am not finished.
- Q. I don't know what question you're answering.
 - A. I am not finished.
- Q. I don't know what question you're answering. That's not what I asked you. I withdraw the question.

What makes your three path flows representative of what actually occurred with contamination at well TT-26?

A. This is the setup that -- this setup, those layers, the permeability is in each one of those layers. The thickness of those layers is directly from the ATSDR model. I am not trying to critique those. I am just adopting them just to show if you do a calculation in the same framework that the ATSDR model is and you do it without mistakes or errors, you actually can get a representation that is like this.

So it gives you representative travel

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time within a large range which is meant to show that you don't have a single model that would tell you the truth because you don't know where the truth is when you don't have data.

- Ο. What makes the three pathways you chose representative of what occurred at TT-26?
- Well, similarly to what the ATSDR model Α. represent, you have transport in layer one, and you have transport in layer three. And in order to go to the well, you have to basically end up in layer three because the well is screened in layer three, not in layer one.

Now, between the source, which is the ABC Cleaner, all the way to the well, you have basically many ways for the groundwater to get there. You don't go there through one single pathway. So that's why I choose some pathways, one which would go a short period of time in layer one and some of that contamination would go through the less permeable layer down to layer three and continue in layer three.

I have another pathway that is closer to the well, and I have another pathway that is in Those are basically estimates that give between. you a range of travel time of this situation.

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1 (Hennet Exhibit 27 was marked.)

BY MR. DEAN:

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- Q. I'm going to show you -- this is my copy. I'm only using page 5-16. It's the same page he's looking at.
- 6 MS. O'LEARY: The report, sure.

7 BY MR. DEAN:

- Q. You've got it in front of you. I'll hand you a copy in a moment, but there's actually four pathways represented here on your chart; right?
- A. There are three pathways to the well screen, the well screen where the pumped water goes through.
- Q. But isn't it true that one of the pathways which you actually show an arrow -- you just stop the arrow -- one of the pathways that you're not considering is the pathway that ATSDR utilized, and that's as I drew on Exhibit 27 where the contaminants go directly in the aquifer all the way to the well; right?
 - A. Again --
 - Q. Is that a possible travel way?

 MS. O'LEARY: Object to form and

THE WITNESS: This is a possible That's an extreme pathway. That will be pathway. the fastest of the fastest, and it doesn't go to the screen, as you know. It goes basically to touch the casing of the well which is basically not accepting water.

BY MR. DEAN:

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- Do you know who Dr. Konikow is? Q.
- Α. I do know who Dr. Konikow is.
- And did you read his report on pages 28 Ο. and 29 where Dr. Konikow calculated the alternative travel time to be only 3-1/2 to 5 years, not the 15 to 25 that you did?
- You have to show me that. And I understand he said something like this. I think it was for groundwater transport, not at all related.
- Do you take issue that Dr. Konikow 0. opined in his rebuttal report it was 3-1/2 to 5 years he calculated? Can you and I agree that's what he said in his report?
 - You have to show me his report. Α.
- Q. I'm going to represent to you that's what it says. Do you disagree or have any basis to disagree with Dr. Konikow's calculations, and

1 | if so, what are the bases of your disagreement?

MS. O'LEARY: Object to foundation.

THE WITNESS: What do you represent

exactly that Dr. Konikow says?

BY MR. DEAN:

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- Q. I'm representing to you that Dr. Konikow calculated an alternative travel time and opined in this case of 3-1/2 to 5 years, not the 15 to 25 you calculated.
- A. Well, I would disagree with Dr. Konikow's calculation.
 - Q. Why?
 - A. Because I made my calculation, and I agree that my calculations are based on site-specific data and they are based the principles of hydrogeology that would allow me to make this calculation that includes the time of travel that it takes for dissolved PCE, which is a compound, a chemical compound in groundwater, and that dissolved PCE is retarded relative to groundwater.

And I took that into consideration, and I focused on the site-specific data. I did not make the same errors that the ATSDR did for the Tawara Terrace model.

Q. So page 5-21 of your report, page 5-21, second sentence, you say in the second sentence "Pumping of well TT-26 was likely not continuous as the well had to be shut down for maintenance and repair."

Do you see that?

- A. I see that.
- Q. You're aware that ATSDR took into account based on the pumping records when these various wells were on and off; right?
- A. ATSDR for well TT-26 took into account two stoppage of the well for maintenance that happened, if I recall, in the 1980s. They did that. But there is no information from before that.

And what ATSDR did in a conservative way, if you wish, was to assume it was always on, never maintained, never stopped, which is wrong because wells that are used for decades, every well needs maintenance or repair.

Q. What evidence do you have, documents, interviews of anybody that you've conducted or review, what factual basis do you have that support a thought, view, your opinion that TT-26 had additional shutdown time not accounted for by

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1 ATSDR?

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2 MS. O'LEARY: Object to form.

THE WITNESS: My answer to this is ATSDR has no information, and, therefore, they assume something that is not realistic in the real world.

BY MR. DEAN:

- Q. Do you have any evidence they are wrong?
- A. My evidence that they are wrong is that you don't have wells that would be pumped for 30 years without being maintained. That doesn't exist.
- Q. You don't have any specific data, any specific documents or specific testimony about specific periods when the wells were shut down; right?

MS. O'LEARY: Objection to form.

THE WITNESS: I believe there is some information. Some capacity test might have been redone. I don't remember specifically for well TT-26. But it is not a correct assumption in my field, in the field of hydrogeology, to assume that because you don't know, it was always on. That is not reasonable.

BY MR. DEAN:

Q. Have you ever evaluated a contamination

1 | site for human risk?

- A. As a geochemist, I do not do human risk. I just do geochemistry.
- Q. For the Hadnot Point spiractor, did you measure the fall height under operating conditions with backwater?

MS. O'LEARY: Object to foundation.

THE WITNESS: With backwater? I do not understand what you mean by that.

10 BY MR. DEAN:

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- Q. When you were there, did you measure the fall height under operating conditions on February 11 when there was any water left in the bottom of the spiractor, tubes, pipes?
 - A. So that means the spiractor was working?
 - Correct.
 - A. I did not do that.
 - O. Ever done that at all?
- A. Could never have done that there.
- Q. Are you aware that 43 percent of Camp Lejeune samples tested for FOC had values less than .0001?

MS. O'LEARY: Object to foundation.

THE WITNESS: Show me the data you are

25 | talking about because --

BY MR. DEAN:

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- I'm just asking. Ο.
- .001 of what? Α.
- Have you ever been stricken as an Q. expert?
 - I have never been stricken as an expert. Α.
- Have you ever had your opinions Q. disregarded by a court in the United States?
- Among all the testimonies I have done in court, which is 12 or 13, there was one time when one of my answer was actually taken away from the record because I addressed a topic that had already been decided before, and that was basically not -- I should not have talked about that. And the judge decided that that should be stricken, my response should be stricken because it had been decided before. And that's what I understand.
- You've never had your opinion -- do you remember the name of that case?
- 21 I believe that case was Titan, Α. T-I-T-A-N, versus -- I think it's versus the 22 23 United States.
- 24 (Hennet Exhibit 28 was marked.)

BY	MR.	DEAN

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- Q. You don't believe a judge has ever disregarded your testimony because he believed that you had insufficient data to provide the opinions that you had given?
- A. I do not recollect any case like this based on data.
- Q. I show you Exhibit 28. Turn to page 75. Are you on page 75?
 - A. Yes.
- Q. Page 75, look at page footnote 31. "The court disregards the testimony of the defense expert Remy Hennet geochemical fingerprints of the PCBs found at the DICO site and those found at the SIM site did not match. During cross-examination, Hennet admitted he was mistaken concerning the data on which he based that opinion. Because the opinion was based on unreliable methods utilizing insufficient facts of data, it is inadmissible under Federal Rule of Evidence 702."

Do you see that? Did I read that correctly?

- A. You read that correctly.
- Q. Now, in the middle of the next paragraph after Federal Rule of Evidence 701, the court went

on to say, "In contrast, the court concludes the testimony by defense expert Dr. Remy Hennet that other sources of PCBs were present on the SIM site constituted impermissible expert testimony. court noted the testimony was based on shear speculation rather than sufficient facts or data and was not the product of reliable principles and Additionally, the court notes the methods. testimony was not supported by personal knowledge or observation as Hennet neither conducted any testing on other items at the SIM site nor observed any labels on other items at the SIM site indicating the presence of PCBs."

Did I read that correct?

- You read that correct. Α.
- Isn't that the same thing you've done in Ο. this case?
 - Pardon me? Α.
- You speculated, you've not taken into consideration other well pumping information that I've shown you today. Isn't that true?

MS. O'LEARY: Object to foundation.

THE WITNESS: I disagree.

BY MR. DEAN:

Q. That court didn't believe anything --

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didn't believe or struck your opinions for the
reasons I just read to you; right?

MS. O'LEARY: Object to form.

BY MR. DEAN:

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Q. That was 2017, September 2017.

MS. O'LEARY: Object to form.

THE WITNESS: Yes, I remember that case.

And I think, you know, for that case there was very little information, and it was basically -- that was the case. That's the way it went. And

(Hennet Exhibit 29 was marked.)

BY MR. DEAN:

the judge made his decision.

Q. I'll show you what I marked as
Exhibit 29 and 30. Exhibit 29, is this the
affidavit you referred to earlier regarding Baby
Washington?

MS. O'LEARY: Object to foundation.

19 BY MR. DEAN:

- Q. Is this your report you issued 5 years ago, 4-1/2 years ago, December 22, 2020 expert report Remy Hennet, In Re: Baby Washington case?
- A. It looks like it. I haven't looked at it in a while, but it looks like it's my expert report, not an affidavit.

1	Q. And this was in a Camp Lejeune case
2	pending back in 2020 when you issued this report
3	MS. O'LEARY: Object to foundation and
4	form.

THE WITNESS: That was one case, one litigation that basically was -- that is basically some correlation to basically Camp Lejeune.

BY MR. DEAN:

Q. And in the bottom paragraph on page 1, last full paragraph, you say, "The opinions presented in this report were reached by applying accepted methods in the fields of hydrogeology, geochemistry and environmental sciences. Opinions expressed in the report are my own based on my education, my training, my experience and the documents, the information, the photographs, the diagrams, the data and the facts available to me at the time of the writing. I hold these opinions to a reasonable degree of scientific certainty."

Did I read that correctly?

- A. You read that correctly.
- Q. And on page 3, next to the bottom paragraph, did you write, "The ATSDR conducted a detailed review of the available data and the information and of the history and contamination

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of the base water systems. (See, for example,
Faye and Venezuela 2007; Sautner, et al., 2013)."

Did I read that correctly?

. You did read that correctly.

Q. You didn't just cite to them. You said they conducted a detailed review; right?

MS. O'LEARY: Object.

THE WITNESS: Yes, I did.

BY MR. DEAN:

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- Q. Turn to page 10, opinion number three, you opined that Holcomb Boulevard water supply wells weren't contaminated during the time period when Rhonda Bell resided on base; did you not?
 - A. It speaks for itself.
- Q. And in the first paragraph, does it read, "The main monthly contaminant concentrations in the Holcomb Boulevard water supply over the period of the relevant" --

MS. O'LEARY: I'm sorry. We're at time.

MR. DEAN: Let me finish this sentence.

BY MR. DEAN:

Q. Did you state, "The mean monthly contaminant concentrations in the Holcomb Boulevard water supply over the period of relevance to the complaint as shown in Exhibit C,"

and you relied upon those in opining Ms. Bell was not there when there was contamination?

- That's at Holcomb Boulevard, and I agree with the ATSDR that the Holcomb Boulevard was not contaminated with the exception of a very short period of time as discussed in my expert report.
- You utilized, relied upon that work, Q. ATSDR work and those reports when you signed this affidavit, this report in 2020; right?
 - I did rely. Α.
 - Did you have time --Ο.
- MS. O'LEARY: I'm sorry. That's your third question now.
- 14 THE WITNESS: Can I answer?
- 15 BY MR. DEAN:

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- 16 Yeah, if you answer my question. Yes or Ο. 17 Did you rely -no.
 - Α. You cannot jump on me and just confuse me.
 - Ο. Yes or no. Did you rely upon ATSDR mean monthly concentration data in order to opine that Ms. Bell was not on base at a time period when contamination existed at Holcomb Boulevard? Did you opine that?
 - Α. Well, my report speaks for itself.

- 1 And you did opine on that issue using 2 ATSDR's work; correct?
- A. I considered the ATSDR work. It is not 3 the same --4
- MS. O'LEARY: I'm sorry. We're 5
- 6 finished.
- 7 THE WITNESS: It is not the same as what I did for this case. 8
- 9 MS. O'LEARY: We've gone over seven hours, and this deposition is finished. 10
- 11 BY MR. DEAN:
- 12 0. Did you have an opportunity --
- 13 MS. O'LEARY: You don't have to answer.
- BY MR. DEAN: 14
- 15 Did you have an opportunity to review 0. 16 and do the same work you've done in this case at 17 that time that you wanted to? Can you answer my 18 question?
- 19 I am advised by counsel that it's out of 2.0 time. I don't have to answer.
- 21 And you're not going to answer my 0. 22 question?
- 23 MS. O'LEARY: I'm instructing you not to
- 24 answer.
- 25 THE WITNESS: I did answer your

1 question. My report stands for itself. 2 BY MR. DEAN: 3 0. No. My question was -- last question I asked you was: Did you have an opportunity to do 4 the same work you did in this case back before you 5 did that report if you wanted to? 6 MS. O'LEARY: I'm instructing you not to 7 8 answer. 9 MR. DEAN: Can we put on the record that 10 Ms. O'Leary has instructed this witness not to 11 answer my last question. What time is it? 12 MS. O'LEARY: Can we put on the 13 record --14 What's the time? MR. DEAN: 15 THE VIDEOGRAPHER: 7 hours and 3 16 minutes. 17 MR. DEAN: 7 hours and 3 minutes. 18 Ms. O'Leary has instructed this witness not to 19 answer my final question. 2.0 Thank you for being here, sir. I wish 21 you'd answer my question, but thank you for the 22 That's all I have at this time. 23 THE VIDEOGRAPHER: We are off the record 24 at 1742.

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(Whereupon, at 5:42 p.m., the taking of

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Page 287
     the instant deposition ceased.)
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1	COMMONWEALTH OF PENNSYLVANIA)
2	COUNTY OF ALLEGHENY) SS:
3	CERTIFICATE
4	I, Ann Medis, RPR, CLR, CSR-WA and
5	Notary Public within and for the Commonwealth of
6	Pennsylvania, do hereby certify:
7	That REMY JC. HENNET, PH.D, the
8	witness whose deposition is hereinbefore set
9	forth, was duly sworn by me and that such
10	deposition is a true record of the testimony given
11	by such witness.
12	I further certify the inspection,
13	reading and signing of said deposition were not
14	waived by counsel for the respective parties and
15	by the witness.
16	I further certify that I am not related
17	to any of the parties to this action by blood or
18	marriage and that I am in no way interested in the
19	outcome of this matter.
20	IN WITNESS WHEREOF, I have hereunto set
21	my hand this 19th day of March, 2025.
22	(mm)ollaber
23	Cher Have
24	Notary Public
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	Page 28
	COMMONWEALTH OF PENNSYLVANIA) E R R A T A COUNTY OF ALLEGHENY) S H E E T
f	I, REMY JC. HENNET, PH.D, have read the foregoing pages of my deposition given on
а	March 20, 2025, and wish to make the following, if any, amendments, additions, deletions or corrections:
E	Page Line Change and reason for change:
_	
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	In all other respects, the transcript is true and correct.
	REMY JC. HENNET, PH.D
_	, day of, 2025.

Page 290 GOLKOW, a Veritext Division 1 One Liberty Place 2 1650 Market Street, Suite 5150 Philadelphia, Pennsylvania 19103 877.370.3377 3 March 26, 2025 5 6 Allison O'Learly, Esquire 7 U.S. Department of Justice 1100 L Street NW Washington, DC 20005 8 Deposition of REMY J.-C. HENNET, PH.D 9 Notice of Non-Waiver of Signature 10 Dear Ms. O'Leary: 11 Please have the deponent read his deposition 12 transcript. All corrections are to be noted on the Errata Sheet. 13 Upon completion of the above, the Deponent must affix his signature on the Errata Sheet, and it is 14 to then be notarized. 15 Please forward the signed original of the Errata 16 Sheet to Kevin R. Dean, Esquire for attachment to the original transcript, which is in his Send a copy of same to all counsel. 17 possession. Please return the completed Errata Sheet within 30 18 days of receipt hereof. 19 Sincerely, 20 21 Ann Medis, RPR, CLR, CSR-WA 22 23 cc: 2.4 25 Kevin R. Dean, Esquire

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Federal Rules of Civil Procedure Rule 30

- (e) Review By the Witness; Changes.
- (1) Review; Statement of Changes. On request by the deponent or a party before the deposition is completed, the deponent must be allowed 30 days after being notified by the officer that the transcript or recording is available in which:
- (A) to review the transcript or recording; and
- (B) if there are changes in form or substance, to sign a statement listing the changes and the reasons for making them.
- (2) Changes Indicated in the Officer's Certificate. The officer must note in the certificate prescribed by Rule 30(f)(1) whether a review was requested and, if so, must attach any changes the deponent makes during the 30-day period.

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ARE PROVIDED FOR INFORMATIONAL PURPOSES ONLY.

THE ABOVE RULES ARE CURRENT AS OF APRIL 1,

2019. PLEASE REFER TO THE APPLICABLE FEDERAL RULES

OF CIVIL PROCEDURE FOR UP-TO-DATE INFORMATION.

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